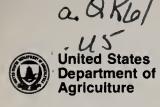
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Soil Conservation Service

Beltsville, Maryland

1980 Annual Technical Report of the National Plant Materials Center

A Summary of the Activities of Calendar Year 1980

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THE

NATIONAL PLANT MATERIALS CENTER 1980 ANNUAL TECHNICAL REPORT

A SUMMARY OF THE ACTIVITIES

OF CALENDAR YEAR 1980



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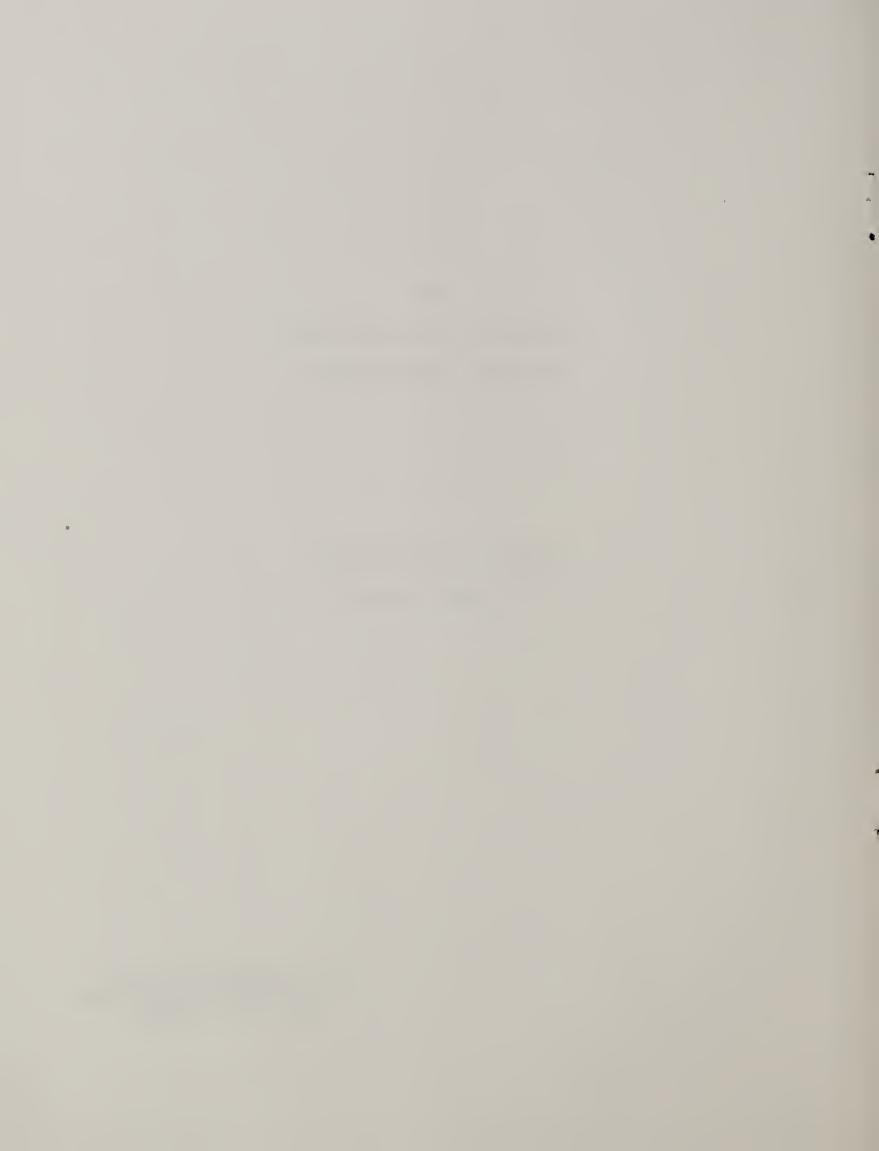


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National Plant Materials Center Soil Conservation Service United States Department of Agriculture

Introduction

1980 marked the 42nd year of service by the National Plant Materials Center to the Soil Conservation Service plant materials program as an introduction, exchange, and observation center for grasses, legumes, trees, and shrubs with potential value in soil and water conservation. All plant materials from foreign countries used in the SCS are processed through this center for initial seed increase and observation. An average of 300 new plant accessions per year are introduced through this center and distributed to 21 field plant materials centers throughout the United States, including Alaska, Hawaii, and Puerto Rico.

Only a few plants distributed from this center through the 21 field plant centers eventually are used to help the farmers, ranchers, cities, and urban communities solve the problems of watershed protection, gully control, shelter belts, wind-erosion control, wildlife borders, and surface mine-land reclamation.

Purpose and Objectives

The National Plant Materials Center at Beltsville, Maryland, is the central facility for assembling, increasing, and distributing plant materials from foreign sources that may be useful in helping to solve conservation problems established in the long-range program of the field plant materials centers.

Functions

- -- Requests, receives, assembles, and, as needed, increases seed and vegetative materials to meet requests of various field PMC's according to priorities established in the long-range program of each PMC.
- -- Works closely with the Plant Introduction Office, Germplasm Resources Laboratory, SEA, at Beltsville, Maryland, to obtain plant materials needed to fill requests of field PMC's.
- -- Serves as coordinator for the acquisition of all accessions from regional plant introduction stations for use by field PMC's.

- -- Works closely with the Plant Introduction Office, Germplasm Resources Laboratory, SEA, to insure compliance with quarantine restrictions governing the flow of plant materials in and out of the United States.
- -- Prepares background information about new plants and other plant materials assembled for distribution.
- -- Assembles and distributes seed and plants to meet foreign request.
- -- Acts as the coordinating office for plant accessioning and plant performance summaries for the plant materials automatic data processing (ADP) storage and retrieval system.
- -- Conducts special projects to help solve problems common to all of several PMC's, such as storage of seed and plants and development of propagation techniques.
- -- Maintains contacts for authoritative identification of plant specimens submitted by SCS personnel.
- -- Provides for the increase of plant materials for final testing if a field PMC is unable to produce adequate amounts.
- -- Provides project assistance to other PMC's when necessary to attain SCS goals.

Administration

The center is administered by the U. S. Department of Agriculture, Soil Conservation Service. Direction for the operation of the center is provided by an advisory committee appointed by the SCS Chief. It consists of the director of the Ecological Sciences Division, who serves as chairman; one state conservationist; one technical service center plant materials specialist; and the director of the Beltsville Agriculture Research Center. The committee meets at least once a year with the NPMC manager and the national plant materials specialist to provide guidance to the center.

The National Plant Materials Center 1980 Advisory Committee is as follows:

Thomas N. Shiflet
Director, Ecological Sciences Division

Gerald R. Calhoun
State Conservationist, Maryland State Office

P. A. Putnum
Director, Beltsville Agriculture Research Center

W. Curtis Sharp
Plant Materials Specialist, Northeast Technical Service
Center

Advisors to NPMC:

Robert S. MacLauchlan
National Plant Materials Specialist, Ecological Sciences
Division

H. Wayne Everett, Staff Plant Materials Specialist, Ecological Sciences Division

Personnel

Stephen K. Salvo Michael McCrary William H. Fry

John A, Oyler
Carol A. Tissue
Richard C. Russell
Robert A. Hood
Daniel L. Palensky
Shawn D. Conrad
Kevin Dugard

Manager (November 80 to Present)
Manager (January 80 to June 80)
Assistant Manager/Soil
Conservationist
Soil Conservationist
Secretary
Biological Technician
Tractor Operator
Gardener
Biological Aid (Summer)
Biological Aid (Summer)

Employee Recognition

Letter of Commendation - Carol Tissue

Grade Promotion - John Oyler

Quality Within Grade Award - Richard Russell

20-Year Service Award - Richard Russell

Physical Features

Location:

The center is located on the Beltsville Agriculture Research Center, Beltsville, Maryland. This location is approximately fifteen miles east of the District of Columbia and twenty miles west of Baltimore, Maryland.

Although surrounded by the densely populated metropolitan Washington area, the center's location within the 7,500-acre Agriculture Research

Center offers isolation from the mainstream. The entire Agriculture Research Center consists of predominantly hardwood forest with numerous openings and fields.

Climate:

The NPMC is located in a humid, continental-type climate, primarily due to the typical west to east atmospheric flow and 43 inches average annual rainfall. Summer weather is dominated by large masses of warm, moist air spreading northward from the south and southwest. The winter weather is rapidly changed from day to day by alternating high and low pressure systems in the west-east flow.

Temperatures of 90°F or higher occur 40 days per year on the average and 32°F or lower occur on 119 days per year. The average annual precipitation is evenly distributed in a typical year. Summer rainfall of significance is generally from thunderstorms or the occasional tropical storm or hurricane that affects the weather.

The growing season averages 162 days with 50 percent probability that it will begin on April 29 and end on October 9.

Major Land Resource Area:

Although the center lies within the Northern Coastal Plain Land Resource Area, it is very near the separation point between the Northern Coastal Plain LRA and the Northern Piedmont LRA.

Soils and Topography:

Soils on the center consist mostly of sandy loams and loamy sands with areas of split loam and clay. Complete soils descriptions and soils map are displayed on page 6. The land varies from gently sloping to moderately sloping. Conservation practices are necessary to prevent erosion. Wind erosion can be severe on the loamy sands unless adequate cover is provided.

Land Area:

The NPMC consists of 140 acres of SCS-owned land. Approximately 80 acres are considered tillable. The majority of the remaining land is in bottomland hardwood forest with a small area of upland hardwood-pine forest. Included in the acreage is a lake covering 17 surface acres. This lake was built about 1940 for irrigation purposes. Beck Branch, a small, year-round stream feeds the lake and meanders through the center's bottomland forest.

Deer, small game, and waterfowl are abundant on the center. Land, not in cultivation, is managed for wildlife according to a conservation plan. Deer and rabbits pose serious threats to observation rows, especially legumes. Groundhogs (woodchucks) cause occasional damage to fields due to their burrowing habit.

The wide variety of plants being increased on the center presents another problem--observing isolation requirements. To accomplish this, five fields are located from one-half to one mile from the headquarters-greenhouse complex.

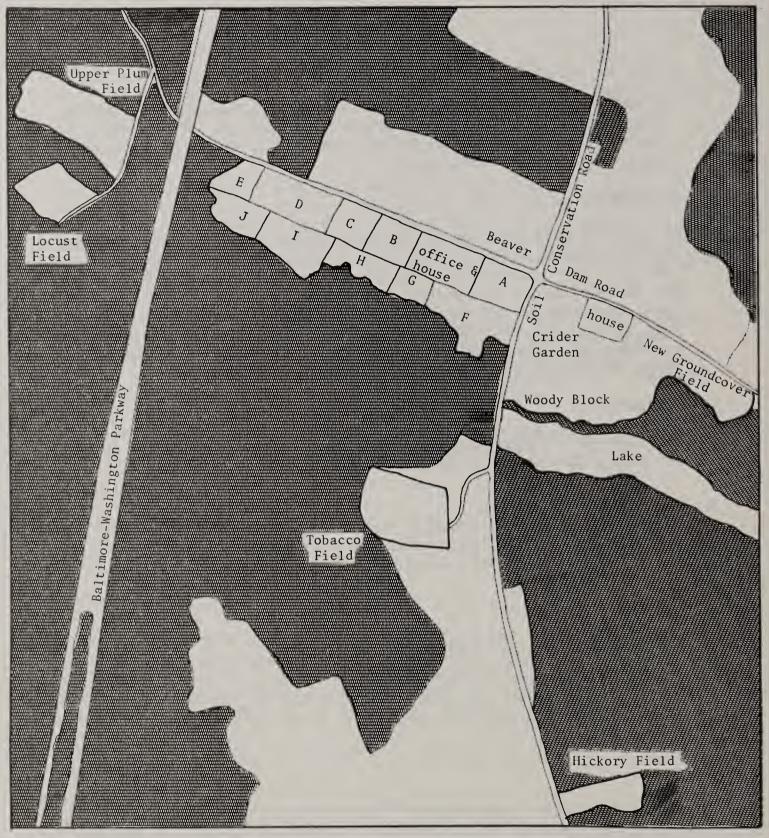
Structures:

Center buildings consist of the main office (Building 509, located near the intersection of Soil Conservation and Beaver Dam Roads); two 75' x 16' glasshouses with attached headhouse and office space for the biological technician; enclosed garage with 30' x 24' shop area; enclosed garage for tractor and equipment storage; seed processing building; and plant storage building. Also, residences are provided on a rental basis for the manager and assistant manager. These residences are also located on the center.

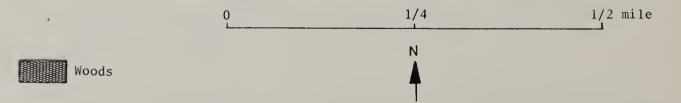
Irrigation:

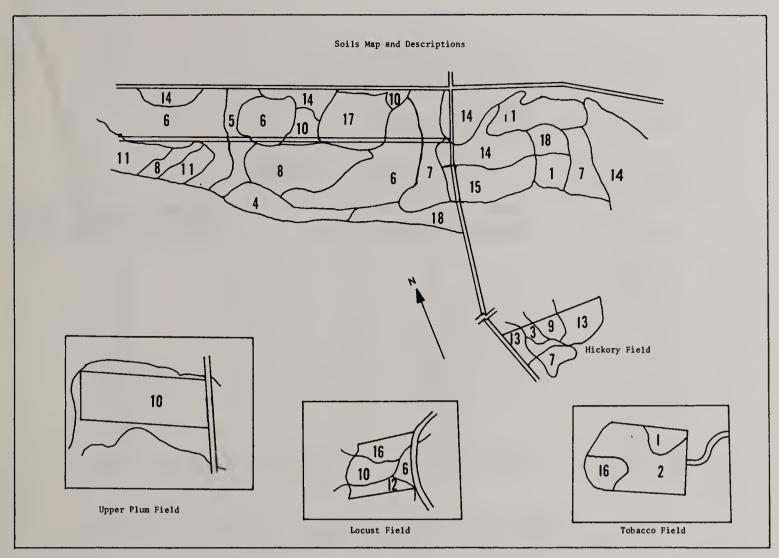
Supplemental irrigation is provided by a portable sprinkler system utilizing fire hydrants as the source of water.

5



Field Boundary Map





- 1 -- Cristiana clay--well drained soils, clayey throughout; most of the surface soil lost through erosion. Capability unit 1Ve-3. Moderate to strong acidity.
- 2 -- Cristiana fine sandy loam--a deep, well drained red clayey soil with a sandy surface and a very high moisture holding capacity.
- Elkton silt loam--poorly drained silt loam over clay or silty clay. Drainage is a major problem. Capability unit IIIw-9. Strong to extreme acidity; the water table near the surface much of the year. Suitable for crops if desired.
- 4 -- Elsinboro sandy loam--sand dominant in the surface layer. Well suited to general crops and deep-rooted crops. Capability unit I-S. High moisture holding capacity.
- Fallsington sandy loam--poorly drained loams and sandy loams. Capability unit lIIw-6. Strongly to extremely acid with moderate moisture holding capacity and moderate fertility. Suitable for farm uses
- 6 -- Galestown Evesboro loamy sands--coarse, loose and droughty.

 Severely limited for farming; protection from wind erosion is necessary. Capability unit lVs-1. Low natural fertility and extreme acidity. Suitable for deep-rooted crops and for shallow-rooted plants if irrigation is supplied when needed.

 Only during long dry periods. Suited to most crops. Capability units IIe-5 and IIIe-S. Acid, require fertilizer for good crops are acidity.

 Sunnyside sandy clay loam--severely eroded if unprotected. Su able for hay or pasturage only, or woodland. Capability unit VIe-2. Well drained, strong to extreme acidity.
- 7 -- Iuka sandy loam--moderately well drained, some drainage aids necessary for cropping. Capability unit IIw-7. Moderate to high moisture holding capability. Strongly to extremely acid. Suitable for gen-
- Keyport fine sandy loam--moderately well drained sandy, silty, and silty clay loams. Erosion rather than drainage is the prime consideration. Capability units IIe-36 and lIIe-36. Strongly acid, natural fertility medium to low. Well suited to some farm crops when managed.
- 9 -- Matapeake silt loam--well drained. Suitable for most crops including tobacco. Capability unit lle-4. High moisture holding capacity and good natural fertility.

- 10 -- Muirkirk loamy sand--erosion hazard from the thick sandy surface layer. Capability units lls-S and IIIe-S. Rapidly permeable, medium to strongly acid, moderate in fertility. Suited to deep-rooted crops only unless irrigated.
- 11 -- Rumford loam sand--medium and coarse sand moderate to dominant in the surface layer. Low in moisture and plant nutrients, but high quality crops can be produced if managed properly. Capability units IIs-4 and IIIe-33. Excessively drained, acid.
- 12 -- Rumford sandy and clayey land--suitable for undemanding farm crops on rotation with long-term pasture or woodland. Dominant sand in the surface layer. Capability units llle-41 and IVe-S. Medium to extreme acidity, fertility low to high.
- 13 -- Sassafras sandy loam--moisture holding capacity is good except for prolonged drought. Erosion is likely unless good farm prac-tices are followed, suited to most crops. Capability unit IIe-S. Acid, productive under fertilization. Suitable for most crops.
- 14 -- Sunnyside fine sandy loam--moderate risk of erosion, droughty only during long dry periods. Suited to most crops. Capability units IIe-5 and IIIe-S. Acid, require fertilizer for good crops.
- 16 -- Sunnyside loam--moderately eroded. Suited to general crops and medium quality tobacco. Capability unit IIIe-4. Deep, well drained, medium to strong acidity. Moderate to high matural fertility.
- 17 -- Sunnyside urban land--disturbed land with no capability unit assigned. Variable potential and productivity.
- 18 -- Woodstown sandy loam--moderately well drained. Both erosion control and improved drainage are needed due to seasonally high water table. Capability units Ile-36 and Ille-36. Moderately coarse textured and strongly acid. Natural fertility is medium to low. Suitable for some crops except where limited by slope.

Weather Data - 1980

Temperature Extremes

Month	Lowest Temperature Recorded for Month (°F)	Highest Temperature Recorded for Month (°F)
January	10	56
February	7	63
March	11	71
April	32	81
May	40	90
June*	43	96
July	53	102
August	60	100
September	41	102
October	31	85
November	23	73
December	0	75

Means

Month	Mean Low For Month	Mean High For Month	Deviation Fr	om Average <u>High</u>
January	27	42	+4	+11
February	23	42	-1	-4
March	33	53	+3	+2
Apri1	45	68	+15	+2
May.	54	79	+4	+5
June*	57	83	-1	+1
July	67	92	+3	+5
August	67	92	+2	+7
September	50	86	- 5	+7
October	45	69	+2	+1
November	35	55	+3	-1
December	26	47	+2	+2

^{*}June temperature data from U. S. Weather Bureau, Climatological Data, Beltsville Station

Normal date of last spring freeze - April 29 Actual data of last spring freeze in 1980 - April 18

Normal date of first fall freeze - October 9 Actual date of first fall freeze in 1980 - October 30

Normal number of freeze-free days - 162 Actual number of freeze-free days in 1980 - 195

Precipitation

Month	Precipitation For Month (Inches)	Deviation From Monthly Average
January	2.60	-0.22
February	0.70	-1.92
March*	4.70	+0.98
April*	4.15	+1.96
May*	4.75	+0.78
June*	2.12	-1.97
July	7.15	+2.55
August	1.67	-3.19
September	1.11	-2.21
October	3.10	+0.06
November	2.80	-0.40
December	0.70	-2.55

^{*}Precipitation data for March through June from U. S. Weather Bureau, Climatological Data, Beltsville Station

Total precipitation recorded in 1980 - 36.55 inches Deviation from average annual precipitation - -6.13 inches

Weather Summary

1980 was both warmer and dryer at the National Plant Materials Center. With the exception of February, each month recorded above normal temperatures. The precipitation for the period August through February was 10.43 inches below normal as compared to 1979 when precipitation for that period was 13.14 inches above normal. Total precipitation for 1980 was 36.55 inches, 6.13 inches below normal.

The last spring freeze occured fifteen days earlier than in 1979 and twenty-one days later in the fall than in 1979. The growing season lasted 195 days, thirty-three days longer than normal.

Plant Materials Received - New Introductions

The National Plant Materials Center maintains a standing request with the Germplasm Resources Laboratory of Science and Education Administration for foreign plant materials needed to fill requests of field plant materials centers. The NPMC also requests material from numerous foreign researchers. During 1980 the NPMC received approximately 5700 accessions of plant materials from 28 foreign countries.

Frequently, material received by the NPMC is in such small amounts that it must be increased before distribution to the field PMC's.

1980 Introductions

Name	<u>Family</u>	No.	Name	<u>Family</u>	No.
Abies balsamea	Pinaceae	1	Acacia doratoxylon	Fabaceae	1
Abies veitchii	11	2	Acacia eburnea	11	1
Acacia abyssinica	Fabaceae	1	Acacia erioloba	11	1
Acacia aciphylla	11	1	Acacia erubescens	11	1
Acacia aculeatissima	11	1	Acacia farnesiana	11	3
Acacia alata	11	1	Acacia fimbriata	11	1
Acacia angustissima	11	1	Acacia galpinii	11	1
Acacia armata	11	2	Acacia genistifolia	11	1
Acacia arenaria	11	1	Acacia gerrardii	11	2
Acacia baileyana	11	1	Acacia glandulicarpa	**	1
Acacia beckleri	11	1	Acacia goetzei	11	1
Acacia berlandieri	11	1	Acacia graffiana	11	1
Acacia binervata	11	1	Acacia hebeclada	11	1
Acacia buxifolia	11	1	Acacia holosericea	11	1
Acacia calamifolia	11	1	Acacia homalophylla	11	1
Acacia cardiophylla	11	1	Acacia horrida	11	2
Acacia cavenia	11	1	Acacia implexa	11	1
Acacia conferta	11	1	Acacia irrorata	11	1
Acacia constricta	11	2	Acacia ixiophylla	11	1
Acacia cupularis	11	1	Acacia jibberdingensis	11	1
Acacia cyanophylla	11	1	Acacia juniperina	11	1
Acacia cyclops	11	2	Acacia karroo	11	3
Acacia davidsonii	11	1	Acacia kao	11	1
Acacia dealbata	11	2	Acacia liebmanii	11	1
Acacia decurrens	11	1	Acacia ligulata	Ħ	1
Acacia dietrichiana	11	1	Acacia linearis	**	1

Name	Family	No.	Name	Family	No.
Acacia lineata	Fabaceae	1	Acacia urophylla	Fabaceae	1
Acacia longifolia	11	6	Acacia verticillata	11	2
Acacia melanoxylon	11	3	Acacia victoriae	11	1
Acacia microbotrya	11	1	Acacia viscidula	11	1
Acacia montana	11	1	Acacia species	11	2
Acacia myrtifolia	11	1	Acer ginnala	Aceraceae	13
Acacia neriifolia	11	1	Acer glabrum	11	2
Acacia <u>nilotica</u>	11	3	Acer negundo	**	11
Acacia oxycedrus	11	1	Acer platanoides	tt	2
Acacia paradoxa	11	1	Acer pseudo-platanus	**	1
Acacia pentigona	11	1	Acer spicatum	ŧŧ	1
Acacia podalyriifolia	ij	1	Acer tataricum	**	13
Acacia polyacantha	11	1	Achillea aegyptiaca	Asteraceae	1
Acacia prominens	11	1	Achillea ageratifolia	**	1
Acacia pycnantha	11	1	Achillea ageratum	11	3
Acacia pyrifolia	11	1	Achillea alpina	11	1
Acacia retinodes	11	2	Achillea bisserata	11	1
Acacia robusta	11	1	Achillea cartilagenea	11	2
Acacia salicina	11	1	Achillea chrysocoma	11	2
Acacia saligna	tt	3	Achillea clavenae	**	3
Acacia schweinfurthii	11	1	Achillea clusiana	11	2
Acacia senegal	11	1	Achillea clypeolata	* 11	3
Acacia seyal	11	1	Achillea collina	11	1
Acacia sieberana	11	1	Achillea crithmifolia	11	1
Acacia smalli	11	1	Achillea distans	11	2
Acacia sophorae	tt	1	Achillea filipendulina		17
Acacia spectabilis	11	1	Achillea grandifolia	11	1
Acacia stricta	11	1	Achillea impatiens	11	1
Acacia suaveolens	11	1	Achillea ligustica	11	1
Acacia swazica	11	1	Achillea lingulata	11	1
Acacia terminalis	11	1	Achillea macrophylla	11	4
Acacia tortilis	11	1	Achillea magna	11	1
Acacia uncinata	11	1	Achillea millefolium	11	36

Name	<u>Family</u>	No.	Name	<u>Family</u>	No.
Achillea nobilis	Asteraceae	3	Alnus rugosa	Betulaceae	2
Achillea odorata	"	3	Alnus serrulata	11	1
Achillea pannonica	11	3	Alnus sinuata	11	2
Achillea ptarmica	11	30	Alnus tenuifolia	11	1
Achillea pyrenaica	11	1	Alopecurus arundinaceu	ıs Poaceae	1
Achillea rupestris	11	1	Alopecurus geniculatus	11	5
Achillea salicifolia	11	1	Alopecurus pratensis	11	2
Achillea setacea	11	2	Amelanchier alnifolia	Rosaceae	5
Achillea sibirica	11	5	Amelanchier asiatica	11	2
Achillea tanacetifolia	11	1	Amelanchier canadensis	"	4
Achillea tomentosa	11	2	Amelanchier oblongifol	<u>ia</u> "	1
Achillea umbellata	11	1	Amelanchier ovalis	11	4
Agastache urticifolia	Lamiaceae	2	Amelanchier spicata	11	4
Agoseris glauca	Asteraceae	2	Amelanchier stolonifer	<u>'a</u> "	1
Agropyron intermedium	Poaceae	7	Ammophila arenaria	Poaceae	1
Agropyron pauciflorum	H	3	Amorpha californica	Fabaceae	1
Agropyron pectiniforme	***	5	Amorpha canescens	11	2
Agropyron repens	11	1	Amorpha fruticosa	11	12
Agropyron smithii	***	1	Amorpha nana	11	2
Agropyron trachycaulon	11	1	Amygdalus nana	Rosaceae	3
Agrostis alba	11	4	Anaphalis margaritacea	Asteraceae	6
Agrostis gigantea	11	15	Anchusa azurea	Boraginaceae	5
Agrostis stolonifera	11	14	Anchusa italica	11	1
Agrostis tenuis	11	8	Antennaria alpina	Asteraceae	5
Agrostis vulgaris	11	3	Antennaria anaphaloide	<u>s</u> "	1
Albizia antunesiana	Fabaceae	1	Antennaria carpatica	11	1
Albizia gummifera	***	1	Antennaria dioica	11	7
Alibzia julibrissin	11	1	Antennaria hansii	tt	1
Albizia lophantha	11	5	Antennaria lanata	11	1
Albizia schimperana	11	1	Antennaria magellanica	11	1
Alchemilla mollis	Rosaceae	3	Antennaria microphylla		1
Alnus crispa	Betulaceae	2	Antennaria neglecta	tt	1
Alnus incana	H	4	Antennaria plantaginif	olia "	1

Name	<u>Family</u>	No.	Name	Family	No.
Antennaria porsildii	Asteraceae	1	Armeria setacea	Plumbaginaceae	2
Antennaria pulcherrima	<u>.</u>	1	Armeria sibirica	ŦŦ	2
Antennaria stenophylla	<u>.</u>	1	Armeria splendens	tt	1
Anthemis tinctoria	ŧŧ	6	Armeria undulata	11	1
Antirrhinum majus	Scrophulariaceae	8 .	Armeria welwitschii	tt	3
Antirrhinum orontium	11	11	Armeria species	tt	1
Aquilegia californica	Ranunculaceae	1	Aronia melanocarpa	Rosaceae	2
Aquilegia formosa	ŦŦ	3	Artemisia abrotanum	Asteraceae	1
Arctostaphylos uva-urs	<u>i</u> Ericaceae	2	Artemisia arctica	11	3
Arenaria montana	Caryophyllaceae	3	Artemisia campestris	tt	17
Arenaria sajanensis	11	1	Artemisia cana	tt	1
Armeniaca vulgaris	Rosaceae	1	Artemisia canariensis	tt	1
Armeria alliacea	Plumbaginaceae	4	Artemisia dracunculus		2
Armeria allioides	ŧŧ	1	Artemisia tilesii	tt	1
Armeria alpina	ŦŤ	7	Artemisia tripartita	tt	1
Armeria arctica	**	1	Artemisia vulgaris	††	22
Armeria arenaria	**	2	Asclepias tuberosa	Asclepiadaceae	1
Armeria caespitosa	tt	1	Aster acris	Asteraceae	3
Armeria cantabica	**	1	Aster adscendens	**	1
Ameria elongata	11	1	Aster alpinus	**	36
Armeria gaditana	1.	1	Aster altaicus	**	3
Armeria halleri	11	4	Aster amellus	tt	10
Armeria juncea	**	1	Aster azureus	**	1
Armeria juniperifolia	11	2	Aster bietii	ŧŧ	1
Armeria leucocephala	11	2	Aster campestris	**	1
Armeria longearistata	tt	1	Aster chilensis	**	2
Armeria maritima	**	28	Aster ciliolatus	**	1
Armeria montana	11	1	Aster conspicuus	**	1
Armeria plantaginea	11	2	Aster cordifolius	11	1
Armeria pseudarmeria	11	4	Aster divaricatus	H	1
Armeria pungens	11	4	Aster dumosus	Ħ	1
Armeria ruscinoensis	11	1	Aster ericoides	tt	2
Armeria scabra		1	Aster farreri	11	3

Name	Family	No.	Name	<u>Family</u>	No.
Aster foliaceus	Asteraceae	4	Aster thomsonii	Asteraceae	7
Aster fremontii	tt	1	Aster tibeticus	11	7
Aster fruticosus	11	2	Aster tongolensis	Ħ	5
Aster purcatus	tt	1	Aster tradescantii	11	2
Aster glehnii	tt	1	Aster tripolium	tt	15
Aster herveyi	tt	1	Aster uliginosus	11	1
Aster himalaicus	tt	4	Aster <u>umbellatus</u>	tt	1
Aster ibericus	tt	1	Aster versicolor	H	1
Aster lanceolatus	tt	3	Aster yunnanensis	11	3
Aster linosyris	tt	16	Astragalus alopecuroide	es Fabaceae	3
Aster maackii	tt	1	Astragalus alpinus	tt	4
Aster macrophyllus	tt	1	Astragalus asper	11	1
Aster modestus	Ħ	1	Astragalus austriacus	Ħ	1
Aster mongolicus	tt	4	Astragalus boeticus	11	3
Aster novae-angliae	tt	6	Astragalus chinensis	u u	1
Aster novi-belgii	tt	4	Astragalus cicer	11	6
Aster oreophilus	11	1	Astragalus depressus	11	1
Aster pansus	11	1	Astragalus epiglottis	11	1
Aster pappei	tt	2	Astragalus falcatus	ii.	4
Aster polycephalus	11	1	Astragalus frigidus	11	1
Aster ptarmicoides	11	1	Astragalus glaux	11	1
Aster purdomii	11	1	Astragalus glycyphyllos	<u>s</u> "	10
Aster pyrenaeus	tt	5	Astragalus hamosus	11	1
Aster rotundifolius	11	3	Astragalus inflatus	11	1
Aster salicifolius	11	1	Astragalus <u>lusitanicus</u>	11	2
Aster salignus	11	4	Astragalus mongholicus	11	1
Aster scaber	11	1	Astragalus monspessular	nus ''	1
Aster sedifolius	11	3	Astragalus onobrychis	11	3
Aster sibiricus	11	5	Astragalus pendulifloru	us "	1
Aster squamatus	11	2	Astragalus robbinsii	11	1
Aster <u>subcaeruleus</u>	11	3	Astragalus sulcatus	11	1
Aster <u>subintegerrimus</u>	11	7	Astragalus vesicarius	11	1
Aster tanacetifolius	11	1	Atriplex acuminata	Chenopodiaceae	1

Name	<u>Family</u>	No.	Name	<u>Family</u>	No.
Atriplex calutheca	Chenopodiaceae	2	Betula verrucosa	Betulaceae	6
Atriplex glabriuscula	**	1	Biota orientalis	Cupressaceae	4
Atriplex glauca	**	1	Biserrula pelecinus	Fabaceae	2
Atriplex halimus	TT .	2	Boltonia latisguama	Asteraceae	2
Atriplex hortensis	††	22	Bouteloua gracilis	Poaceae	2
Atriplex inflata	††	2	Bouteloua hirsuta	tt	1
Atriplex leucoclada	11	1	Brassica juncea	Brassicaceae	17
Atriplex littoralis	**	5	Brassica napus	11	31
Atriplex nitens	††	4	Brassica rapa	11	22
Atriplex patula	11	13	Bromus asper	Poaceae	1
Atriplex rosea	tt	4	Bromus briziformis	11	1
Atriplex sibirica	**	1	Bromus ciliatus	11	1
Atriplex tatarica	**	3	Bromus commutatus	11	3
Aurinia saxatilis	Brassicaceae	12	Bromus erectus	11	29
Baptisia australis	Fabaceae	13	Bromus hordeaceus	tt	4
Baptisia tinctoria	ŦŦ	3	Bromus mollis	11	8
Bauhina aculeata	**	1	Bromus pumpellanus	11	1
Bauhina candicans	**	1	Bromus racemosus	tt	3
Bauhina diphylla	**	1	Bromus ramosus	Ħ	7
Bauhina galpinii	***	1	Bromus secalinus	††	13
Bauhina petersiana	**	2	Buchloe dactyloides	11	1
Bauhina purpurea	***	2	Bunium orientalis	Apiaceae	1
Bauhina tomentosa	"	2	Buphthalmum salicifoli	um Asteraceae	6
Bauhina variegata	tt	1	Calamagrostis arundina	icea Poaceae	7
Beckmannia erucaeformi	s Poaceae	5	Calamagrostis canescer	15 11	3
Beckmannia syzigachne	**	1	<u>Calamagrostis</u> <u>epigeios</u>	<u>; </u>	16
Belamcanda chinensis	Iridaceae	1	C. pseudophragmites	11	1
Betula alba	Betulaceae	1	Calamagrostis varia	Ħ	1
Betula glandulosa	**	1	Calamovilfa longifolia	<u>L</u>	1
Betula nana	**	6	Calendula officinalis	Asteraceae	28
Betula occidentalis	Ħ	1	<u>Callistemon</u> <u>brachyandr</u>	rus Myrtaceae	2
Betula papyrifera	11	5	Callistemon citrinus	11	2
Betula pendula	11	8	<u>Callistemon</u> <u>cuccineus</u>	**	1

Name	<u>Family</u>	No.	Name	<u>Family</u>	No.
Callistemon cumboynen	sis Myrtaceae	1	Caragana grandiflora	Fabaceae	1
<u>Callistemon</u> hortensis	- 11	1	Caragana microphylla	11	1
Callistemon jeffersii	. 11	1	Caragana pygmaea	11	3
<u>Callistemon</u> <u>linearis</u>	11	3	Cardamine pratensis	Brassicaceae	1
Callistemon macropunc	tatus "	1	Carex arenaria	Cyperaceae	2
Callistemon paludosus	. "	1	Carex atrata	11	2
<u>Callistemon</u> pendulus	11	1	Carex atrofusca	11	1
<u>Callistemon</u> phoeniceu	<u>s</u> "	4	Carex burbaumii	11	1
Callistemon pinifoliu	<u>s</u> "'	2	Carex buxbaumii	11	1
<u>Callistemon</u> pityoides	. 11	1	Carex caldeaae	**	1
Callistemon rigidus	11	2	Carex canariensis	11	1
Callistemon rosea	11	1	Carex capillaris	**	1
<u>Callistemon</u> <u>rugulosus</u>	. 11	1	Carex caryophyllea	11	1
<u>Callistemon</u> <u>salignus</u>	11	2	Carex depauperata	tt	1
<u>Callistemon</u> <u>semperflo</u>	rens "	1	Carex distans	tt	1
<u>Callistemon</u> <u>sheresii</u>	11	1	Carex disticha	11	1
<u>Callistemon</u> <u>sieberii</u>	11	1	Carex divida	ŧŧ	1
<u>Callistemon</u> <u>speciosus</u>	. 11	3	Carex divulsa	11	2
<u>Callistemon</u> <u>viminalis</u>		1	Carex echinata	11	1
<u>Callistemon</u> <u>violaceus</u>	. 11	1	Carex flacca	11	4
Calluna vulgaris	Ericaceae	2	Carex grayii	11	1
Calothamnus blepharospermus	Myrtaceae	1	Carex hirta	11	2
Calothamnus quadrifid	·	1	<u>Carex</u> horderstichos	11	2
Calothamnus schaueri	11	1	Carex lepidocarpa	††	1
Campanula alaskana	Campanulaceae	1	Carex lyngbyei	tt	1
Campanula auceri	ti -	1	<u>Carex</u> <u>michelii</u>	11	1
Campanula rotundifoli	a ''	9	Carex muricata	11	1
Caragana arborescens	<u>-</u> Fabaceae	23	Carex nigra	tt	1
Caragana boisii	11	1	Carex otrubae	11	1
Caragana camilli-		•	Carex paludosa	tt	1
schneideri schneideri	11	1	Carex panicea	Ħ	1
Caragana decurticans	11	1	Carex paniculata	††	1
Caragana frutex	11	6	Carex paupercula	Ħ	1

Name	<u>Family</u>	No.	Name	<u>Family</u>	No.
Carex pendula	Cyperaceae	4	Cassia obtusifolia	Fabaceae	1
Carex pseudo-cyperus	tt	2	Cassia occidentalis	11	3
Carex pulicaris	11	1	Cassia odorata	11	2
Carex remota	tt	1	Cassia petersiana	11	1
Carex scaposa	tt	1	Cassia phyllodinea	11	1
Carex stricta	Ħ	1	Cassia pleurocarpa	11	1
Carex sylvatica	11	4	Cassia schultesii	11	1
Carex tomentosa	tt	1	Cassia senna	11	3
Carex vesicaria	11	1	Cassia sericea	11	1
Carex vulgaris	tt	1	Cassia siamea	**	1
Carex vulpina	Ħ	4	Cassia sinqueana	tt	1
Cassia abbreviata	Fabaceae	1	Cassia sophera	11	1
Cassia aciphylla	tt	1	Cassia sturtii	tt	1
Cassia alata	11	1	Cassia surattensis	11	1
Cassia bicapsularis	11	2	Cassia tomentosa	11	1
Cassia biflora	11	1	Cassia tora	11	2
Cassia brewsteri	tt	1	Cassia torosa	14	1
Cassia carnaval	11	1	Cassia wislizenii	11	1
Cassia circinnata	11	1	Castilleja miniata	Scrophulariaceae	1
Cassia coronilloides	tt	1	Castilleja unalaschens	is "	1
Cassia corymbosa	11	2	<u>Casuarina</u> <u>acutivalvis</u>	Casuarinaceae	1
Cassia desolata	tt	1	Casuarina corniculata	"	1
Cassia didymobotrya		2	Casuarina cristata	11	2
Cassia eremophila	tt	3	Casuarina distyla	11	2
Cassia excelsa	tt	1	Casuarina equisetifoli	<u>a</u> ''	2
Cassia floribunda	11	2	Casuarina humilis	11	1
Cassia helmsii	tt	` 1	Casuarina lehmanniana	11	1
Cassia leptophylla	tt	1	Casuarina littoralis	11	1
Cassia mimosoides	11	2	Casuarina luehmannii	11	1
Cassia multijuga	tt	1	Casuarina muellerana	tt	1
Cassia nemophylla	tt	3	Casuarina nana	11	1
Cassia nobosa	tt	1	Casuarina paludosa	11	1
Cassia notabilis	**	1	Casuarina stricta	11	2

Name	<u>Family</u>	No.	Name	Family	No.
Casuarina torulosa	Casuarinaceae	2	Chamaenerion angustifolia	Onagraceae	16
Casuarina species	11	1	Chamaenerion latifoliu		2
Catananche coerulea	Asteraceae	4		uit ·	2
Ceanothus americanus	Rhamnaceae	4	Chamaespartium tridentatum	Fabaceae	1
Ceanothus arboreus	**	1	Chasmanthium latifoliu	m Poaceae	7
Ceanothus delilianus	11	1	Cheiranthus aloinii	Brassicaceae	1
Ceanothus foliosus	11	1	Chrysanthemum carinatu	m Asteraceae	6
Ceanothus ovatus	11	1	Chrysanthemum coronari	um "	14
Ceanothus sanguineus	11	1	C. leucanthemum	11	7
Ceanothus thyrsiflorus	**	2	Chrysanthemum segetum	11	11
Ceanothus velutinus	11	1	Chrysopsis villosa	11	4
Celtis australis	Ulmaceae	11	Chrysothamnus nauseosu	ıs "	2
Celtis bungeana	11	1	Cicer arietinum	Fabaceae	1
Celtis caucasica	11	1	Cichorium intybus	Asteraceae	28
Celtis glabrata	tt	1	Clematis borachiata	Ranunculaceae	1
Celtis jessoensis	11	2	Clematis flammula	11	1
Celtis <u>laevigatus</u>	11	1	Clematis microphylla	11	1
Celtis occidentalis	***	10	Clematis welwitschii	11	1
Celtis pumila	11	1	Clethra alnifolia	Clethraceae	1
<u>Celtis</u> <u>sinensis</u>	11	2	Coix lacryma-jobi	Poaceae	12
<u>Celtis</u> yunnanensis	11	1	Collinsia bicolor	Scrophulariaceae	2
Centaurea cyanus	Asteraceae	10	Collinsia heterophylla	<u>.</u> "	1
Centaurea dealbata	11	5	Consolida ajacis	Ranunculaceae	4
Centaurea montana	11	8	Consolida ambigua	"	5
Centrosema pubescens	Fabaceae	7	Consolida orientalis	**	4
Cerasus avium	Rosaceae	1	Conyza canadensis	Asteraceae	7
<u>Cerasus</u> <u>besseyi</u>	11	1	Coreopsis lanceolata	**	8
Cerasus tomentosa	11	1	Cornus alba	Cornaceae	17
Ceratonia siliqua	Fabaceae	1	Cornus alternifolia	**	7
Cercis siliquastrum	11	15	Cornus amomum	11	3
Chamaecyparis obtusa	Cupressaceae	2	Cornus obliqua	**	8
Chamaecyparis pisifera	- 11	3	Cornus sanguinea	11	26
Chamaedaphne caliculat	<u>a</u> Ericaceae	1	Cornus sericea	**	3

Name	<u>Family</u>	No.	Name 1	Family	No.
Cornus stolonifera	Cornaceae	8	Cotoneaster dammeri	Rosaceae	3
Cornus suecica	tt	6	Cotoneaster dielsiana	11	10
Coronilla argentea	Fabaceae	1	Cotoneaster disticha	11	3
Coronilla cappodocia	tt	2	Cotoneaster divaricata	11	11
Coronilla coronata	11	4	Cotoneaster elegans	11	1
Coronilla cretica	11	1	Cotoneaster foveulata	11	5
Coronilla emerus	11	8	Cotoneaster francheti	11	13
Coronilla eremurus	11	2	Cotoneaster frigida	11	5
Coronilla glauca	11	1	Cotoneaster glaucophylla	<u>a</u> ''	2
Coronilla juncea	11	1	Cotoneaster harroviana	11	2
Coronilla minima	11	1	Cotoneaster harrysmithi	Ĺ	3
Coronilla montana	11	1	Cotoneaster hebephylla	11	1
Coronilla orientalis	11	2	Cotoneaster henryana	• 11	1
Coronilla reptanda	11	1	Cotoneaster hissarica	11	1
Coronilla scorpioides	11	5	Cotoneaster horizontalis	<u>s</u> "	19
Coronilla vaginalis	11	2	Cotoneaster hupehensis	11	4
Coronilla valentina	11	5	Cotoneaster hybrida	11	2
Coronilla varia	ш	17	Cotoneaster ignavus	11	1
Corydalis glauca	Fumariaceae	1	Cotoneaster insignis	T?	2
Corydalis sempervirens	. :	3	Cotoneaster integerrima	11	20
Cotoneaster acuminata	Rosaceae	3	Cotoneaster karatavicus	Ħ	1
Cotoneaster acutifolia	. "	7	Cotoneaster lactea	tt	10
Cotoneaster adpressa	11	5	Cotoneaster lindleyi	tt .	2
Cotoneaster affina	11	1	Cotoneaster lucida	11	12
Cotoneaster allochrus	11	1	Cotoneaster melanocarpa	11	4
Cotoneaster amoina	11	1	Cotoneaster microphylla	11	11
Cotoneaster apiculata	11	3	Cotoneaster moupinensis	tt	9
Cotoneaster bacillaris	. "	1	Cotoneaster multiflora	11	11
Cotoneaster bullata	11	18	Cotoneaster nanshan	11	2
Cotoneaster buxifolia	11	4	Cotoneaster nebrodensis	tt	5
Cotoneaster congesta	11	2	Cotoneaster niger	11	6
Cotoneaster conspicua	11	2	Cotoneaster nitens	11	6
Cotoneaster crispa	11	1	Cotoneaster nitidifolia	11	1

Name	Family	No.	Name	<u>Family</u>	No.
Cotoneaster obscura	Rosaceae	3	Crataegus durobrivensis	Rosaceae	1
Cotoneaster oligantha	11	1	Crataegus intricata	11	1
Cotoneaster pannosa	**	3	Crataegus macrosperma	11	1
Cotoneaster praecox	11	7	Crataegus maximowiczii	11	5
Cotoneaster pseudoambig	ua ''	1	Crataegus punctata	11	3
Cotoneaster racemiflora	. "	5	Crataegus rivularis	11	1
Cotoneaster racemosa	**	1	Crataegus rotundifolia	11	1
Cotoneaster reticulata	11	1	Crataegus sanguinea	11	3
Cotoneaster rhytidophyl	lus "	1	Crepis capillaris	Asteraceae	2
Cotoneaster rosea	11	6	Crepis paludosa	!!	1
Cotoneaster rotundiflor	<u>a</u> "	2	Crotalaria capensis	Fabaceae	1
Cotoneaster salicifolia	"	15	Crotalaria cleomifolia	11	1
Cotoneaster saxatilis	11	1	Crotalaria goreensis	11	1
Cotoneaster serotina	11	1	Crotalaria lachnophora	11	1
Cotoneaster sikangensis	11	1	Crotalaria lanceolata	11	1
Cotoneaster sikkimensis		1	Crotalaria ochroleuca	11	1
Cotoneaster simonsii	11	1	Crotalaria pallida	11	1
Cotoneaster skogholm	11	1	Crotalaria retosa	11	1
Cotoneaster splendens	11	2	Crotalaria rogersii	11	1
Cotoneaster steriana	11	1	Crotalaria virgulata	11	1
Cotoneaster taurica	11	1	Cuscuta europaea	Convolvulaceae	1
Cotoneaster tomentosa	11	3	Dactylis aschersoniana	Poaceae	1
Cotoneaster wardii	11	6	Dactylis glomerata	11	9
Cotoneaster watereri	. 11	4	Dactylis hispanica	11	1
Cotoneaster zabelli	11	5	Dactylis polygama	11	5
Cotoneaster aeravschani	cus "	2	Dactylis smithii	11	1
Cotoneaster species	***	, 2	Dactylis woronowii	11	1
Cowania stansburiana	11	1	Daphne mezereum	Thymelaeaceae	23
Crataegus chlorocarpa	11	4	Datura stramonium	Solonaceae	1
Crataegus chlorosarca	11	7	Deschampsia cespitosa	Poaceae	20
Crataegus chrysocarpa	11	2	Deschampsia flexuosa	11	11
Crataegus coccinea	11	1	Deschampsia media	11	1
Crataegus douglasii	11	9	Desmodium canadensis	Fabaceae	9

Name	<u>Family</u>	No.	Name	<u>Family</u>	No.
Desmodium cinerascens	Fabaceae	1	Elymus pycnanthus	Poaceae	1
Desmodium intortum	**	3	Elymus racemosa	ff	1
Deutzia gracilis	Philadelphaceae	3	Elymus sibiricus	**	7
Diapensia lapponica	Diapensiaceae	1	Elymus virginicus	ŧŧ	3
Dievilla lonicera	Caprifoliaceae	2	Empetrum nigrum	Empetraceae	4
Dievilla sessilifolia	11	1	Enkianthus campanulatus	s Ericaceae	10
Digitalis purpurea	Scrophulariaceae	27	Enneapogon persicus	Poaceae	1
Dodonaea attenuata	Sapindaceae	2	Ephedra distachya	Ephedraceae	1
Dodonaea lanceolata	11	1	Ephedra equisetina	**	1
Dodonaea viscosa	u u	1	Epilobium anagallidifo	lium Onagraceae	1
Dolichos cebra	Fabaceae	1	Epilobium angustifolium	m tt	22
Dolichos jacquinii	**	1	Epilobium hornmannii	†t	1
Dolichos <u>lablab</u>	**	6	Epilobium lactiflorum	††	1
Dolichos ornatus	**	3	Epilobium montanum	11	1
Doronicum austriacum	Asteraceae	2	Epilobium palustre	**	5
Doronicum caucasicum	11	2	Epilobium spicatum	11	1
Doronicum pardalianches		3	Erigeron acris	Asteraceae	8
Dryas drummondii	Rosaceae	1	Erigeron aliceae	11	1
Dryas octopetala	11	9	Erigeron alpinus	##	4
Echinacea angustifolia	Asteraceae	3	Erigeron annuus	11	2
Echinacea purpurea	**	4	Erigeron atticus	11	1
Echinops bannaticus	11	2	Erigeron aurantiacus	11	6
Elaeagnus angustifolia	Elaeagnaceae	12	Erigeron bellidifolius	11	1
Elaeagnus argentea	11	1	Erigeron bonariensis	11	1
Elaeagnus commutata	11	6	Erigeron borealis	11	5
Elymus arenarius	Poaceae	9	Erigeron candidus	tt	1
Elymus canadensis	11	2	Erigeron compositus	11	1
Elymus caput-medusce	11	1	Erigeron crispum	11	2
Elymus condensatus	11	2	Erigeron eriocephalus	11	1
Elymus europaeus	11	1	Erigeron flagellaris	11	1
Elymus gigantius	11	1	Erigeron gaudinii	11	1
Elymus glaucus	11	1	Erigeron glabellus	11	4
Elymus paboanus	11	1	Erigeron glaucus	11	2

Name	Family	No.	Name Family	No.
Erigeron grandiflorus	Asteraceae	3	Eschscholzia californica Papaveracea	e 13
Erigeron howellii	11	1	Eucalyptus almenioides Myrtaceae	1
Erigeron humilis	11	2	Eucalyptus alpina "	1
Erigeron karvinskianus	11	1	Eucalyptus amphlifolia "	1
Erigeron leiomerus	11	1'	Eucalyptus amygdalina "	1
Erigeron macranthus	11	1	Eucalyptus andreana "	1
Erigeron mucronatus	tt	1	Eucalyptus andrewsii "	1
Erigeron naudini	11	1	Eucalyptus angulosa "	1
Erigeron oreganus	***	1	Eucalyptus approximans "	1
Erigeron orientalis	11	1	Eucalyptus baeuerlenii "	2
Erigeron peregrinus	tt.	1	Eucalyptus bancroftii "	1
Erigeron polymorphus	tt	1	Eucalyptus banksii "	1
Erigeron pulchellus	II .	2	Eucalyptus baxteri "	2
Erigeron radicatus	tt	1	Eucalyptus beyeri "	1
Erigeron roylei	tt	1	Eucalyptus blakelyi "	2
Erigeron speciosus	tt	9	Eucalyptus blaxlandii "	1
Erigeron subtrinervis	tt	1	Eucalyptus botryoides "	1
Erigeron thunbergii	11	1	Eucalyptus caesia "	2
Erigeron umbellatum	11	1	Eucalyptus caliginosa "	1
Erigeron unalaschkensis	11	1	Eucalyptus calophylla "	1
Erigeron uniflorus	11	3	Eucalyptus camaldulensis "	1
Erigeron venustus	11	1	Eucalyptus cambageana "	1
Erigeron villarsii	tt	2	Eucalyptus capitellata "	1
Eriogonum umbellatum	Polygonaceae	2	Eucalyptus cephalocarpa "	1
Erysimum hieraciifolium	Brassicaceae	1	Eucalyptus cinerea "	1
Erysimum odoratum	11	2	Eucalyptus cladocalyx "	1
Erythrina abyssinica	Fabaceae	1	Eucalyptus cneorifolia "	1
Erythrina bogotensis	11	1	Eucalyptus coccifera "	1
Erythrina crista-galli	11	2	Eucalyptus cordata "	1
Erythrina humeana	11	1	Eucalyptus cosmophylla "	1
Erythrina lysistemon	11	1	Eucalyptus crebra "	3
Erythrina viarum	11	1	Eucalyptus cyanophylla "	1
Eschscholzia caespitosa	Papaveraceae	1	Eucalyptus dalrympleana "	1

Name	<u>Family</u>	No.	Name	Family	No.
Eucalyptus dealbata	Myrtaceae	1	Eucalyptus kruseana	Myrtaceae	1
Eucalyptus deanei	11	1	Eucalyptus leptophleba	11	1
Eucalyptus decipiens	11	1	Eucalyptus leptopoda	11	1
Eucalyptus delegatensi	11	1	Eucalyptus lesouefii	11	1
Eucalyptus diversifoli	ia "	1	Eucalyptus leucoxylon	tt	1
Eucalyptus dives	11	1	Eucalyptus lirata	11	1
Eucalyptus dunnii	11	1	Eucalyptus longifolia	11	1
Eucalyptus dwyeri	11	1	Eucalyptus loxophleba	tt	1
Eucalyptus elata	11	1	Eucalyptus luehmanniana	<u>.</u> "	1
Eucalyptus eremophila	11	1	Eucalyptus macrorhyncha	<u>.</u> "	2
Eucalyptus erythrocory	<u>/S</u> "	3	Eucalyptus maculata	11	1
Eucalyptus eudesmoides	5 "	1	Eucalyptus maidenii	11	2
Eucalyptus eugenioides	<u>s</u> "	1	Eucalyptus major	11	1
Eucalyptus exserta	11	2	Eucalyptus mannifera	11	2
Eucalyptus fasciculosa	<u>a</u> "	1	Eucalyptus megacarpa	11	1
Eucalyptus fibrosa	11	1	Eucalyptus moluccana	11	1
Eucalyptus ficifolia	11	1	Eucalyptus morrisii	11	1
Eucalyptus flocktoniae	<u>e</u> "	1	Eucalyptus muellerana	11	1
Eucalyptus gamophylla	11	1	Eucalyptus nesophila	11	1
Eucalyptus glabulus	11	1 ·	Eucalyptus nitens	11	1
Eucalyptus globdidea	11	1	Eucalyptus nitida	11	1
Eucalyptus gomphocepha	ala "	1	Eucalyptus normantonens	is "	1
Eucalyptus griffithsii	."	1	Eucalyptus notabilis	11	2
Eucalyptus grossa	11	1	Eucalyptus nubilis	11	1
Eucalyptus incrassata	11	1	Eucalyptus occidentalis	11	2
Eucalyptus intermedia	11	1	Eucalyptus odorata	11	1
Eucalyptus intertexta	11	2	Eucalyptus oligantha	11	1
Eucalyptus johnstonii	11	1	Eucalyptus orbifolia	11	1
Eucalyptus jucunda	11	1	Eucalyptus orpetii	11	1
Eucalyptus kesselli	"	1	Eucalyptus ovata	11	1
Eucalyptus kingsmillii	<u>i</u> "	1	Eucalyptus ovularis	11	1
Eucalyptus kitsoniana	11	_ 2	Eucalyptus pachyloma	11	1
Eucalyptus kondininens	sis "	1	Eucalyptus pachyphylla	11	1

Name	Family	No.	Name	Family	No.
Eucalyptus parramattens	sis Myrtaceae	2	Eucalyptus tenuiramis	11	1
Eucalyptus patens	tt	1	Eucalyptus tereticorni	<u>s</u> "	1
Eucalyptus pauciflora	tt	1	Eucalyptus tessellaris	. "	1
Eucalyptus pellita	11	1	Eucalyptus tetragona	11	2
Eucalyptus peltata	11	1	Eucalyptus todtiana	"	1
Eucalyptus perriniana	tt	2	Eucalyptus trabuti	11	1
Eucalyptus phaeotricha	tt	1	E. transcontinentalis	11	1
Eucalyptus pilularis	11	1	Eucalyptus triantha	11	1
Eucalyptus plancholiana	<u>1</u>	1	Eucalyptus triflora	11	1
Eucalyptus platycorys	11	1	Eucalyptus umbra	11	1
Eucalyptus platypus	11	1	Eucalyptus viminalis	11	1
Eucalyptus preissiana	11	1	Eucalyptus websteriana	11	1
Eucalyptus pulchella	tt	1	Eucalyptus woollsiana	11	1
Eucalyptus pulverulenta	<u>1</u> ***	1	Eucalyptus youngiana	"	1
Eucalyptus pumila	tt	1	Eucalyptus youmanii	11	1
Eucalyptus punctata	tt	1	Eucalyptus zygophylla	11	1
Eucalyptus pyrocarpa	tt	1	Eucalyptus species	11	1
Eucalyptus quadrangulat	<u>:a</u> "	1	Euonymus alata	Celastraceae	8
Eucalyptus redunca	**	1	Filipendula hexapetala	Rosaceae	5
Eucalyptus regnans	11	1	Fragaria virginiana	11	1
Eucalyptus robusta	11	2	Frangula alnus	Rhamnaceae	32
Eucalyptus rossii	11	1	Fraxinus pennsylvanica	01eaceae	4
Eucalyptus rubida	11	1	Fremontodendron		
Eucalyptus salmonophloi	<u>.a</u> "	1	californicum	Sterculiaceae	1
Eucalyptus sessilis	11	1	Gaillardia aristata	Asteraceae	5
Eucalyptus sideroxylon	11	2	Gaillardia grandiflora		4
Eucalyptus smithii	11	1	Gaillardia pulchella	11	3
Eucalyptus stellulata	11	1	Galega officinalis	Fabaceae	9
Eucalyptus stenostoma	11	1	Gaultheria procumbens	Ericaceae	2
Eucalyptus stowardii	11	1	Geranium robertianum	Geraniaceae	7
Eucalyptus striaticalyx	<u> </u>	1	Gilia achilleafolia	Polemoniaceae	7
Eucalyptus stricklandii	. "	2	Gilia capitata	11	7
Eucalyptus tenuipes	- 11	1	Gleditsia monosperma	Fabaceae	1
			Gleditsia triacanthos	11	8

Name	<u>Family</u>	No.	Name	<u>Family</u>	No.
Grevillea crithmifolia	Proteaceae	1	Holodiscus dumosus	Rosaceae	2
Grevillea leucopteris	11	1	Hyparrhenia hirta	Poaceae	2
Grewia avellana	Tiliaceae	1	Hypericum androsaemum	Clusiaceae	1
Grewia biloba	11	1	Hypericum ascyron	11	6
Grewia flava	11	1	Hypericum calycinum	11	1
Grewia flavescens	"	1	Hypericum canariense	11	3
Grewia hexamita	11	1	Hypericum coris	11	1
Grewia hornbyi	11	1	Hypericum elatum	11	1
Grewia occidentalis	11	1	Hypericum patulum	11	6
Grewia pachycalyx	11	1	Hypericum reflexum	11	2
Grewia retinervis	11	1	Hypericum rhodeum	11	1
Grewia schinzii	11	1	Hypericum roeperanum	· 11	1
Grewia stolzii	11	1	Hypericum romanus	11	1
Grewia sulcata	11	1	Hypericum tetrapterum	11	1
Grewia villosa	11	1	Hypericum uralum	11	1
Hedysarum alpinum	Fabaceae	3	Hypericum webbii	11	1
Hedysarum arcticum	11	2	Hypochoeris radicata	Asteraceae	12
Hedysarum boreale	11	1	<u>Iberis</u> <u>sempervirens</u>	Brassicaceae	6
Hedysarum candidum	11	1	Impatiens capensis	Balsaminaceae	1
Hedysarum coronarium	11	6	Impatiens noli-tangere		2
Hedysarum hedysaroides	11	3	Iris missouriensis	Iridaceae	5
Hedysarum multijugum	11	2	Iris pseudacornus	H	1
Hedysarum tauricum	11	1	<u>Iris setosa</u>	11	12
Helianthus annuus	Asteraceae	20	Isopogon buxifolius	Proteaceae	1
Helianthus laetiflorus	11	1	Isopogon dubius	H	1
Helianthus tuberosus	11	1	Juglans nigra	Juglandaceae	2
Heliopsis scabra	11	3	Juniperus ashei	Cupressaceae	1
Hemerocallis citrina	Liliaceae	1	Juniperus cedrus	#1	3
Hemerocallis flava	11	6	Juniperus chinensis	11	2
Hemerocallis lilioasphodelus	**	2	Juniperus communis	11	21
Hesperis matronalis	Brassicaceae	14	Juniperus drupacea	tt	1
		18	Juniperus horizontalis	11	1
Hippophae rhamnoides	Elaeagnaceae		Juniperus occidentalis	11	1
Holodiscus discolor	Rosaceae	9			

Name	<u>Family</u>	No.	Name	<u>Family</u>	No.
Juniperus oxycedrus	Cupressaceae	6	Leucaena latisiliqua	Fabaceae	5
Juniperus phoenicea	11	10	Leucaena leucocephala	11	3
Juniperus pseudosabina	11	1	Leucanthemum vulgare	Asteraceae	13
Juniperus rigida	11	1	Liatris spicata	11	14
Juniperus sabina	11	1	Ligusticum mutillina	Apiaceae	1
Juniperus scopulorum	11	2	Ligusticum scoticum	11	5
Juniperus sibiricum	11	3	Ligustrina amurensis	Oleaceae	1
Juniperus squamata	11	1	<u>Ligustrum</u> <u>ibota</u>	11	1
Juniperus virginiana	11	4	Lilium bulbiferum	Liliaceae	1
Juniperus wallichiana	11	1	Limnanthes douglasii	Limnanthaceae	3
Kalmia latefolia	Ericaceae	3	Linaria genistifolia	Scrophulariaceae	2
Kennedia prostrata	Fabaceae	1	Linaria maroccana	TT.	1
Kochia prostrata	Chenopodiaceae	2	Lindelofia longiflora	Buraginaceae	2
Koeleria cristata	Poaceae	2	Linum perenne	Linaceae	11
Kunzea baxteri	Myrtaceae	1	Lobelia fulgens	Campanulaceae	2
Laburnum alpinum	Fabaceae	1	Loiseleuria procumbens	Ericaceae	1
Larix dicidua	Pinaceae	1	Lolium multiflorum	Poaceae	19
Larix gmelinii	11	2	Lolium perenne	11	73
Lathyrus japonicus	Fabaceae	5	Lolium remotum	11	1
Lathyrus latifolius	11	20	Lolium temulentum	11	15
Lathyrus palustris	11	5	Lonicera caerulea	Caprifoliaceae	12
Lathyrus sylvestris	11	30	Lonicera chrysantha	11	4
Lathyrus venosus	11	2	Lonicera floribunda	11	1
Lathyrus vernus	11	5	Lonicera fragrantissim	<u>a</u> ''	3
Lavandula angustifolia	Lamiaceae	2	Lonicera gibbiflora	11	1
Leersia oryzoides	Poaceae	1	Lonicera heterophylla	11	1
Leptospermum abnorme	Myrtaceae	1	Lonicera involucrata	11	6
<u>Leptospermum</u> <u>flavescens</u>	. "	3	Lonicera korolkowii	11	6
<u>Leptospermum</u> <u>lanigerum</u>	11	1	Lonicera maackii	11	10
<u>Leptospermum</u> <u>obovatum</u>	11	1	Lonicera standishii	11	3
<u>Leptospermum</u> <u>scoparium</u>	11	4	Lonicera tatarica	11	23
<u>Leptospermum</u> <u>stellatum</u>	11	1	Lonicera xylosteoides	11	1
<u>Leptospermum</u> <u>species</u>	11	1	Lotus corniculatus	Fabaceae	3

Name	<u>Family</u>	No.	Name	Family	No.
Lotus pedunculatus	Fabaceae	2	Medicago polymorpha	Fabaceae	16
Lotus tenuis	"	1	Medicago sativa	11	10
Lotus uliginosus	"	13	Melaleuca adnata	Myrtaceae	1
<u>Lupinus</u> <u>angustifolius</u>	11	1	Melaleuca capitata	11	1
Lupinus arcticus	11	4	Melaleuca cheelii	11	1
Lupinus argenteus	11	1	Melaleuca diosmifolia	11	1
Lupinus luteus	11	42	Melaleuca elliptica	11	2
<u>Lupinus</u> <u>nootkatensis</u>	11	3	Melaleuca glomerata	11	1
Lupinus polyphyllus	Fabaceae	12	Melaleuca huegalii	11	1
<u>Lupinus</u> <u>succulentus</u>	11	7	Melaleuca hypericifoli	<u>a</u> "	2
Lychnis chalcedonica	Caryophyllaceae	9	Melaleuca leucadendron	<u>.</u> "	1
Lycium barbarum	Solonaceae	1	Melaleuca megacephala	11	1
Lycium chinense	11	5	Melaleuca polygaloides	<u>.</u>	1
Lycium paalidum	11	1	Melaleuca pubescens	11	1
Lythrum salicaria	Lythraceae	19	Melaleuca quinquenervi	<u>.a</u> ''	1
Machaeranthera tanacetifolia	Asteraceae	1	Melaleuca seriata	11	1
Macroptilium	Asteraceae	1	Melaleuca teretifolia	11	1
atropurpureum	Fabaceae	15	Melaleuca viridiflora	11	1
Malus baccata	Rosaceae	11	Melaleuca species	11	1
Malus cerasifera	11	1	Melilotus alba	Fabaceae	22
Malus communis	11	1	Melilotus officinalis	11	10
Malus fusca	"	1	Mimulus guttatus	Scrophulariaceae	8
Malus micromalus	11	1	Mimulus <u>lewisii</u>	11	5
Malus praecox	"	1	Mimulus luteus	11	12
Malus purpurea	11	2	Miscanthus sinensis	Poaceae	3
Malus sargentii	"	2	Molinia caerulea	**	1
Malus sieboldii	11	1	Monarda fistulosa	Lamiaceae	11
Malus sylvestris	11	9	Myrica caroliniensis	Myricaceae	1
Malus transitoria	"	2	Myrica cerifera	"	3
Malva moschata	Malvaceae	13	Myrica pensylvanica	"	7
Malva sylvestris	11	8	Nemophila maculata	Hydrophyllaceae	5
Medicago falcata	Fabaceae	3	Nemophila menziesii	11	2
Medicago lupulina	11	17	Nicotiana velutina	Solonaceae	1

Name	<u>Family</u>	No.	Name	Family	No.
Oenothera biennis	Onagraceae	25	Penstemon campanulatu	s Scrophulariaceae	7
Oenothera caespitosa	11	3	Penstemon cardinalis	11	1
Oenothera erythrosepala	. "	5	Penstemon confertus	11	4
Oenothera fruticosa	11	5	Penstemon cordifolius	11	1
Oenothera lamarckiana	"	6	Penstemon cyananthus	II.	1
Oenothera muricata	n .	2	Penstemon diffusus	11	5
Orobus vernus	Fabaceae	1	Penstemon digitalis	11	2
Oxytropis campestris	"	2	Penstemon diphyllus	11	2
Oxytropis halleri	11	1	Penstemon eatonii	11	2
Padus maheleb	Rosaceae	1	Penstemon fendleri	11	1
Padus racemosa	11	1	Penstemon garnet	11	1
Padus serotina	11	2	Penstemon gentianoide	<u>s</u> ''	1
Padus virginiana	11	2	Penstemon glaber	11	1
Panicum miliaceum	Poaceae	1	Penstemon gloxinoides	п	1
Panicum virgatum	**	2	Penstemon gracilis	"	2
Papaver commutatum	Papaveraceae	1	Penstemon grandiflorus	<u>s</u> "	3
Papaver lapponicum	11	2	Penstemon hallii	11	1
Papaver nudicaule	11	9	Penstemon hartwegii	11	1
Papaver rhoeas	11	19	Penstemon heterophyllu	us "	2
Paspalum dilatatum	Poaceae	6	Penstemon hibridus	11	1
Paspalum distichum	Ħ	1	Penstemon hirsutum	11	5
Paspalum scrobiculatum	11	1	Penstemon laevigatus	11	7
Paspalum stoloniferum	**	2	Penstemon linarioides	11	1
Paspalum thunbergii	11	1	Penstemon menziesii	11	3
Paspalum urvillei	ŦŤ	2	Penstemon newberryi	11	3
Penstemon acuminatus	Scrophulariaceae	1	Penstemon ovatus	11	3
Penstemon alpinus	**	2	Penstemon parryi	11	1
Penstemon arizonicus	11	4	Penstemon pinifolius	11	1
Penstemon attenuatus	11	2	Penstemon procerus	11	3
Penstemon azureus	tt	3	Penstemon rattanii	11	1
Penstemon barbatus	11	9	Penstemon richardsoni	<u>i</u> "	3
Penstemon barettae	11	2	Penstemon roezlii	**	1
Penstemon calycosus	TT	2	Penstemon scouleri	11	5

Name	<u>Family</u>	No.	Name	<u>Family</u>	No.
Penstemon secundifloru	us Scrophulariace	ae 2	Picea abies	Pinaceae	3
Penstemon serrulatus	tt	3	Picea glauca	11	2
Penstemon stenopetalus	3	1	Picea pungens	11	2
Penstemon tolmiei	**	1	Pinus armandii	11	1
Penstemon utahensis	71	1	Pinus attenuata	11	1
Penstemon venustus	**	1	Pinus banksiana	11	3
Penstemon watsonii	11	1	Pinus brutia	11	1
Penstemon whippleanus	††	1	Pinus bungeana	**	1
Phacelia campanularia	Hydrophyllaceae	4	Pinus cannariensis	11	4
Phacelia franklinii	11	1	Pinus cembra	11	3
Phacelia tanacetifolia	<u>.</u> "	14	Pinus clausa	**	1
Phalaris aquatica	Poaceae	14	Pinus densiflora	**	2
Phalaris arundinacea	tt	8	Pinus echinata	11	9
Phalaris canariensis	tt	12	Pinus elliottii	11	8
Phalaris minor	11	6	Pinus halepensis	11	1
Philadelphus caucasicu	ns Philaelphaceae	2	Pinus koraiensis	11	3
Philadelphus coronariu	ıs "	8	Pinus lambertiana	**	1
Philadelphus gordonian	nus "	1	Pinus monticola	"	2
Philadelphus lewesii	11	3	Pinus mugo	"	5
Philadelphus pekinensi	.s ^{tt}	1	Pinus nigra	**	5
Philadelphus schrenkii	- -	3	Pinus oocarpa	11	1
Philadelphus tenuifoli	us "	2	Pinus palustris	11	6
Philadelphus tomentosa	<u>L</u> "	1	Pinus parviflora	11	1
Photinia villosa	Rosaceae	9	Pinus peuce	11	1
Phragmites australis	Poaceae	5	Pinus pinaster	Ħ	5
Phyllodoce aleutica	Ericaceae	1	Pinus pinea	11	7
Phyllodoce caerulea	11	1	Pinus ponderosa	**	3
Physocarpus amurensis	Rosaceae	5	Pinus pumila	**	2
Physocarpus capitatus	tt	5	Pinus rigida	**	3
Physocarpus intermediu	<u>ıs</u> ''	4	Pinus stankewiczii	**	1
Physocarpus malvaceus	11	1	Pinus strobus	**	4
Physocarpus monogynus	tt ,	1	Pinus sylvestris	**	8
Physocarpus opulifoliu	<u>ıs</u> "	12	Pinus taeda	11	10

Name	Family	No.	Name	<u>Family</u>	No.
Pinus thunbergii	Pinaceae	1	Prunus tenella	Rosaceae	2
Pinus virginiana	11	2	Prunus tomentosa	11	1
Pinus wallichiana	11	2	Prunus virginiana	11	11
Poa alpina	Poaceae	1	Psathyrostachys juncea	Poaceae	4
Poa ampla	11	1	Psoralea americana	Fabaceae	1
Poa angustifolia	11	4	Psoralea bituminosa	"	11
Poa compressa	ŧŧ	15	Psoralea macrostachya	11	1
Poa glauca	11	1	Psoralea onobrychis	11	1
Poa nemoralis	11	15	Puccinellia distans	Poaceae	7
Poa palustris	Ħ	16	Pyrus ussuriensis	Rosaceae	1
Poa trivialis	11	8	Ranunculus acris	Ranunculaceae	9
Polemonium acutiflorum	m Polemoniaceae	4	Ranunculus flammula	11	1
Polemonium boreale	11	1	Ranunculus repens	11	7
Polemonium caeruleum	11	15	Ranunculus sceleratus	11	6
Polemonium pulcherrim	um "	1	Ranunculus trichophyll	us ''	1
Potentilla fruticosa	Rosaceae	5	Reseda luteola	Resedaceae	20
Potentilla recta	11	10	Reseda scoparia	11	1
Poterium officinale	11	1	Rhamnus californica	Rhamnaceae	1
Pourthiaea villosa	H	1	Rhamnus catharticus	11	15
Prunus armeniaca	H	1	Rhamnus davuricus	н .	7
Prunus avium	11	4	Rhamnus japonica	11	3
Prunus cerasifera	11	3	Rhamnus saxitilis	11	4
Prunus demissa	11	1	Rhododendron camtschaticum	Ericaceae	2
Prunus depressa	11	1		tricaceae	1
Prunus dulcis	ŧŧ	1	R. dauricum		4
Prunus fruticosa	11	1	R. schlippenbachii	**	3
Prunus maackii	11	2	R. vaseyi	Anacardiaceae	
Prunus mandschurica	11	1	Rhus aromatica	Anacardiaceae	4
Prunus maritima	11	1	Rhus copallina	11	3
Prunus padus	11	2	Rhus glabra	11	3
Prunus pensylvanica	Ħ	3	Rhus typhina		14
Prunus pumila	Ħ	3	Ribes atropurpureum	Grossulariaceae	1
Prunus serotina	11	9	Ribes aureum	11	4
			Ribes meyeri	"	1

Name	<u>Family</u>	No.	Name	<u>Family</u>	No.
Ribes odoratum	Grossulariaceae	1	Rosa <u>hugonis</u>	Rosaceae	1
Ribes petraeum	"	3	Rosa iliensis	11	4
Rosa acicularis	Rosaceae	11	Rosa jundzellii	11	2
Rosa agrestis	"	2	Rosa laxa	11	3
Rosa alba	"	1	Rosa majalis	11	3
Rosa albertii	**	1	Rosa maracandica	11	1
Rosa arkansana	"	1	Rosa marretii	11	2
Rosa beggariana	"	3	Rosa micrantha	11	1
Rosa bella	**	1	Rosa mollis	11	1
Rosa blanda	11	5	Rosa montana	11	1
Rosa brunonii	11	1	Rosa moyesii	"	6
Rosa canina	11	30	Rosa multibracteata	"	1
Rosa carolina	11	1	Rosa muriculata	**	1
Rosa caudata	11	1	Rosa nitida	11	1
Rosa centifolia	11	3	Rosa nutkana	11	2
Rosa chinensis	11	2	Rosa omiensis	**	2
Rosa coriifolia	**	1	Rosa omissa	11	2
Rosa corymbifera	"	1	Rosa palustris	11	2
Rosa damascena	"	2	Rosa pendulina	11	7
Rosa davidii	"	1	Rosa pimpinellifolia	11	11
Rosa davurica	"	1	Rosa pisocarpa	Ħ	2
Rosa dupontii	"	1	Rosa pouzinii	11	1
Rosa ecae	"	1	Rosa prattii	11	1
Rosa fedtschenkoana	"	1	Rosa pulverulenta	11	1
Rosa forrestiana	**	1	Rosa roxburghii	11	3
Rosa gállica	**	6	Rosa rubiginosa	H	6
Rosa giraldii	"	1	Rosa rubrifolia	11	4
Rosa glauca	"	5	Rosa rugosa	11	27
Rosa gultinosa	"	1	Rosa sancti-andreae	11	1
Rosa gymnocarpa	"	1	Rosa sempervirens	11	3
Rosa heleniae	"	1	Rosa serafinii	11	2
Rosa hemsleyana	"	1	Rosa setipoda	11	1
Rosa hirtula	**	1	Rosa sinowilsonii	11	1

Name	<u>Family</u>	No.	Name	<u>Family</u>	No.
Rosa soulieana	Rosaceae	1	Salvia judaica	Lamiaceae	1
Rosa spinosissima	Ħ	4	Salvia lanigera	11	1
Rosa sweginzowii	H	2	Salvia microstigia	11	1
Rosa tomentosa	H	2	Salvia officinalis	11	1
Rosa tuschetica	11	2	Salvia palaestina	**	1
Rosa ultramontana	11	1	Salvia patens	tt	1
Rosa villosa	11	11	Salvia pinnata	11	1
Rosa virginiana	11	1	Salvia samuelssonii	**	1
Rosa waitziana	11	1	Salvia sclarea	11	1
Rosa watsoniana	tt	2	Salvia spinosa	**	1
Rosa webbiana	11	1	Salvia splendens	11	1
Rosa wichuriana	11	1	Salvia syriaca	11	1
Rosa willmottiae	11	1	Sambucus canadensis	Caprifoliaceae	8
Rosa woodsii	11	3	Sambucus glauca	**	5
Rosa xanthina	11	2	Sambucus nigra	11	40
Rubus fruticosus	11	2	Sambucus pubens	11	4
Rubus idaeus	tt	4	Sambucus racemosa	*1	32
Rubus laciniatus	Ħ	5	Sanguisorba canadensis	Rosaceae	2
Rubus vulgaris	11	1	Sanguisorba officinali	.s "	6
Rudbeckia hirta	Asteraceae	4	Sanguisorba sitchensis	11	1
Rumex confertus	Polygonaceae	1	Saponaria officinalis	Caryophyllaceae	36
Salix lanata	Salicaceae	2	Saxifraga aizoon	Saxafragaceae	1
Salix pentandra	11	1	Scirpus americanus	Cyperaceae	2
Salvia aegyptiaca	Lamiaceae	1	Scirpus caespitosus	**	1
Salvia aurea	11	2	Scirpus cernuus	11	1
Salvia azurea	11	1	Scirpus cyperinus	11	1
Salvia broussonetii	11	1	Scirpus fluitan	11	1
Salvia coccinea	11	1	Scirpus holoschoenus	n	3
Salvia dominica	11	1	Scirpus hudsonianus	**	1
Salvia eigii	tt	1	Scirpus juncoides	11	1
Salvia fruticosa	11	1	Scirpus lacustris	11	9
Salvia hierosolymitana	11	1	Scirpus maritimus	11	2
Salvia indica	11	1	Scirpus microcarpus	11	1

Name	<u>Family</u>	No.	Name	<u>Family</u>	No.
Scirpus paludosus	Cyperaceae	1	Spiraea chamaedryfolia	Rosaceae	4
Scirpus palustris	11	1	Spiraea corymbosa	11	1
Scirpus setaceus	11	1	Spiraea densiflora	11	3
Scirpus sylvaticus	11	5	Spiraea filipendula	11	2
Sedum acre	Crassulaceae	9	Spiraea gemmata	11	1
Sedum lanceolatum	11	1	Spiraea japonica	11	9
Senecio anteuphorbium	Asteraceae	1	Spiraea lucida	11	1
Senecio cineraria	11	1	Spiraea media	11	3
Senecio grandifolius	11	1	Spiraea nipponica	11	6
Senecio magnificus	11	1	Spiraea trilobata	11	2
Senecio murrayi	11	1	Spriaea ulmaria	11	1
Senecio palmensis	11	1	Spiraea wilsonii	11	1
Senecio petasitis	11	1	Stenactis speciosus	Asteraceae	1
Senecio webbii	11	1	Stokesia cyanea	11	1
Shepherdia argentea	Elaeagnaceae	1	Symphoricarpos albus	Caprifoliaceae	6
Shepherdia canadensis	11	2	S. chenaultii	11	3
Silene acaulis	Caryophyllaceae	1	S. occidentalis	11	3
Silene armeria	11	7	S. orbiculatus	11	12
Silene inaperta	11	4	S. oreophilus	11	2
Silene maritima	11	2	S. racemosus	11	1
Silene rupestris	11	1	Syringa amurensis	01eaceae	1
Silene vulgaris	11	1	Syringa emodi	11	1
Silphium laciniatum	Asteraceae	4	Syringa komarowii	11	1
Sitanion hystrix	Poaceae	1	Syringa sweginzowii	11	2
Sophora velutina	Fabaceae	1	Syringa villosa	11	2
Sophora vicifolia	11	1	Syringa vulgaris	11	4
Sorbaria sorbifolia	Rosaceae	11	Tagetes erecta	Asteraceae	10
Spartina pectinata	Poaceae	2	Tagetes patula	11	8
Sphaeralcea eremicola	Malvaceae	1	Tanacetum boreale	11	1
Spiraea alba	Rosaceae	1	Tanacetum vulgare	11	13
Spiraea albiflora	tt	1	Taxus baccata	Taxaceae	7
Spiraea betulifolia	tt.	1	Teramnus labialis	Fabaceae	5
Spiraea bullata	11	1	Thalictrum collinum	Ranunculaceae	1

Name	<u>Family</u>	No.	Name	<u>Family</u>	No.
Thalictrum squarrosum	Ranunculaceae	1	Viburnum lentago	Caprifoliaceae	9
Thermopsis montana	Fabaceae	2	Viburnum nudum	11	1
Thuja occidentalis	Cupressaceae	14	Viburnum opulus	11	35
Thuja orientalis	11	11	Viburnum orientale	"	1
Tilia cordata	Tiliaceae	8	Viburnum prunifolium	***	2
Trifolium alpestre	Fabaceae	1	Viburnum pubescens	**	1
Trifolium alpinum	11	1	V. rhytidophylloides	***	1
Trifolium ambiguum	"	2	V. rhytidophyllum	**	5
Trifolium angustifolium	. "	1	Viburnum rufidulum	11	1
Trifolium arvense	***	26	Viburnum sargentii	tt	5
Trifolium aureum	**	4	Viburnum trilobum	TT.	4
Trifolium badium	**	1	Vicia cassubica	Fabaceae	3
Trifolium campestre	**	12	<u>Vicia</u> cordata	11	1
Trifolium dubium	**	1	Vicia cracca	tt	7
Trifolium lupinaster	**	1	Vicia dalmatica	tt	1
Trifolium medium	11	6	<u>Vicia</u> gigantea	11	1
Trifolium montanum	11	1	<u>Vicia</u> <u>hirsuta</u>	tt	1
Trifolium ochroleucon	**	1	<u>Vicia</u> <u>orobus</u>	**	2
Trifolium pannonicum	tt	1	Vicia pisiformis	**	2
Trifolium pratense	H	1	<u>Vicia</u> <u>sativa</u>	11	1
Trifolium rubens	11	1	<u>Vicia</u> <u>sepium</u>	11	16
Trifolium spumosum	11	1	Vicia sylvatica	11	1
Trifolium stellatum	11	4	Vicia tetrasperma	11	1
Trifolium subterraneum	**	1	<u>Vicia</u> <u>villosa</u>	11	1
Trifolium wormskjoldii	11	1	Vigna <u>luteola</u>	11	3
Vaccinium vitis-idaea	Ericaceae	4			
<u>Valantia</u> <u>hispita</u>	Rubiaceae	1			
Viburnum burejaeticum	Caprifoliaceae	1			
<u>Viburnum</u> <u>carlesii</u>	11	4			
<u>Viburnum</u> <u>cassinoides</u>	**	1			
<u>Viburnum</u> <u>dentatum</u>	11	6			
<u>Viburnum</u> <u>edule</u>	11	1			
Viburnum lantana	11	25			

Plant Materials Acquired from SEA Regional Plant Introduction Stations

The NPMC serves as coordinator for the acquisition of all accessions from regional plant introduction stations for use by field plant materials centers. These regional plant introduction stations of the Science and Education Administration are located at Geneva, New York; Ames, Iowa; Experiment, Georgia; and Pullman, Washington.

Following is a list of field PMC's and plant materials received from the regional plant introduction stations in 1980:

Species		Number of Accessions
Glycine wightii	Americus, Georgia PMC	1
	Big Flats, New York PMC	
Trifolium agrarium		1
	Lockeford, California PMC	
Agropyron elongatum		35
Agropyron intermedi	<u>um</u>	44
Agropyron intermedi	um var. trichophorum	47
Elymus sp.		2
Festuca arundinacea		11
Juniper communis		3
	Quicksand, Kentucky PMC	
Poa trivialis		1
	Rose Lake, Michigan PMC	
Calamagrostis epige	ios	1

Literature Reviews

The NPMC receives numerous requests for information on plants, their culture, and use in conservation. Requests come from field plant materials centers, plant materials specialists, state and federal agencies, research organizations, and private individuals in this country and abroad. To service these requests, the NPMC maintains a generic file and utilizes the literature search capability of the National Agricultural Library (NAL). Publications cited in the searches can be requested and copies received from the NAL or other sources. Some of the major topics researched in 1980 were:

<u>Topic</u>	Requestor	Publications Received
Agropyron smithii - distribution, propagation, utilization, physiology, ecology, uses	NM PMC	
Alnus glutinosa - germination, growth, nitrogen fixation	GA PMS	12
Amelanchier sp distribution, propagation, use, physiology, ecology	NM PMC	
Anthephora sp propagation, use, disease, weed control	NM PMC	
Artemesia sp distribution, propagation, use, physiology, associated species	NM PMC	
Arundo donax - propagation, growth, culture, seed processing	GA PMS	10
Atriplex canadensis - management, growth, salt tolerance, propa- gation, moisture stress tolerance,		
coal mine reclamation	NM PMC	
Atriplex confertifolia - growth, seeding, establishment, propagation, uses, distribution	NM PMC	
Bouteloua curtipendula - distribution, use, propagation, physiology, forage, mine spoil reclamation	NM PMC	
Bouteloua gracilis - distribution, use, propagation, physiology, ecology, cultural practices	NM PMC	

<u>Topic</u>	Requestor	Publications Received
Bouteloua hirsuta - distribution, use, propagation, physiology, ecology	NM PMC	
Buchloe dactyloides - distribution, propagation, use, physiology, ecology	NM PMC	
Calamovilfa gigantea - distribution, propagation, use, seedling, establishment	NM PMC	
Ceanothus fendleri - distribution, propagation, use, physiology, ecology	NM PMC	
Chilopsis linearis - distribution, propagation, physiology, use in windbreaks	NM PMC	
Couania mexicana - distribution, propagation, use, physiology, associated species	NM PMC	
Dactylis glomerata - drought tolerance	WV PMS	
<u>Distichis stricta</u> - distribution, propa- gation, physiology, ecology, use in landscape	NM PMC	
Eurotia lanata - propagation, establish- mnet, use, physiology	NM PMC	
Fallugia paradoxa - distribution, propagation, use, physiology	NM PMC	
Gaillardia pennatifida - distribution, propagation, use, physiology, ecology	NM PMC	
Hilaria belangeri - distribution, propagation, use, physiology, ecology	NM PMC	
Hilaria jamesii - distribution, propagation, use, physiology	NM PMC	
Imperata cylindrica - distribution, forage value, control, response to grazing and fertilization	FL PMC	

<u>Topic</u>	Requestor	Publications Received
Juniperus monosperma - distribution, propagation, physiology, use as windbreak and screen	NM PMC	
Juniperus scopulorum - propagation, physiology, cultural practices, use as windbreak	NM PMC	
Juniperus virginiana - distribution, use, propagation, physiology, culture, ecology	NM PMC	
Juniperus sp dispersal, adaptation, pests, effect on forage, effect of fire	WI PMS	12
Koeleria cristata - distribution, propa- gation, uses, physiology, associated species	NM PMC	
Lathyrus sylvestris - culture, use, chemical composition	WV PMS	1
Leptochloa dukia - distribution, propagation, use, physiology, associated species	NM PMC	
Lycurus phleoides - distribution, use, propagation, production	NM PMC	
Medicago sativa - distribution, propa- gation, physiology, use, drought tolerance	NM PMC	
Muhlenbergia richardsonis - distribution, use, propagation, physiology, ecology	NM PMC	
Oryzopsis hymenoides - distribution, use, propagation, physiology	NM PMC	
Panicum obtusum - distribution, use, propagation, physiology, ecology	NM PMC	
Parthenocissus quinguefolia - ecology, use, distribution, propagation, physiology	NM PMC	
Paulownia sp use in reclamation, effect of herbicide and growth regulators	GA PMS	4

<u>Topic</u>	Requestor	Publications Received
Pinus edulis - distribution, propagation, ecology, physiology, culture, use	NM PMC	
Pinus ponderosa - propagation, seedling establishment, germina- tion, culture, use in windbreaks	NM PMC	
Potentilla fruticosa - distribution, propagation, physiology, ecology, use in landscaping and mine spoil reclamation	NM PMC	
Prunus lonceolata - distribution, propagation, use, physiology, ecology	NM PMC	
Prunus virginiana var. demissa - distribution, propagation, uses, culture	NM PMC	
Psoralea lanceolata - distribution, propagation, physiology, ecology, use	NM PMC	
Purshia tridentata - distribution, propagation, uses, physiology, associated species	NM PMC	
Rhus trilobata - distribution, propagation, use, physiology, ecology, culture	NM PMC	
Sitanion hystrix - distribution, propagation, use	NM PMC	
Sphaeralcea coccinea - bud gall	NM PMC	
Sporobolus cryptandrus - distribution, use, physiology, propagation, associated species	NM PMC	
Sporobolus wrightii - distribution, propagation, use, physiology, ecology	NM PMC	
Sporobolus sp ecology, nutrition, control, forage quality, water stress, pasture revegetation,	NIA DIAC	
effect of innundation	NM PMC	

Topic	Requestor	Publications Received
Stipa sp distribution, propagation, use, physiology, associated species	NM PMC	
Thuja orientalis - distribution, propagation, culture, physiology, uses, ecology	NM PMC	
Tripsacum dactyloides - culture, morphology, cytology, use in range	KS PMC	6
Vicia sp distribution, propagation, use, physiology, ecology, culture	NM PMC	
Zinnia pumila - distribution, propa- gation, use, physiology, ecology, culture	NM PMC	
Grasses - tolerant to common herbicides use for weed control in soybeans and cotton	MS PMS	
Grasses - for waterways resistant to herbicides used in corn and soybeans	MO PMC	
Legumes - persistant in tall fescue pasture and enhancing the forage quality	MO PMC	
Legumes - native to the northeast, use for coal mine reclamation, soil conservation, forage, wildlife	WV PMS	
<u>Legumes</u> - native to the southwest	NM PMC	
Forbs - native to the southwest	NM PMC	
Forb-seed storage - longevity, quality, viability, cultivation, reclamation	NY PMC	50
Vegetation - for use in extremely acid mine spoil areas	MS PMS	16
Vegetation - used for erosion control on fresh water shorelines	GA PMS	
Vegetation - use for surface mine reclamation in the southwest: mulch, forbs trees, grass, legumes, irrigation	NM PMC	

<u>Topic</u>	Requestor	Publications Received
Vegetation - native to the York Canyon Area near Raton, New Mexico; in the Four Corners area of New Mexico, Arizona, Utah, Colorado; Taos, New Mexico; and Red River area, near Questa, New Mexico	NM PMC	
Seed - cleaning, damage, processing, mechanical	MO PMS	
Tissue Culture - techniques and use in plant propagation	NM PMC	
Cover Crops - used in vineyards: culture and management, effect on frost damage to grapes, water stress on grapes	NY PMS	37

Seed Production - 1980

During 1980 the National Plant Materials Center produced seed of 168 accessions of 67 species of plants which were requested by field PMC's.

Grasses

PI or T Number	Name	Source	Grams
T-6641	Alopecurus geniculatus	Denmark	Trace
T-6642	Alopecurus geniculatus	Denmark	1
T-6643	Alopecurus pratensis	France	Trace
380671	Alopecurus pratensis	Iran	Trace
380672	Alopecurus pratensis	Iran	Trace
T-7131	Bromus ramosus ssp. benekeni	Denmark	55
T-7132	Bromus ramosus	Denmark	2
T-7133	Bromus ramosus ssp. ramosus	Denmark	65
380770	Bromus tomentellus	Iran	Trace
380772	Bromus tomentellus	Iran	Trace
380774	Bromus tomentellus	Iran	Trace
384811	Bromus tomentellus	Iran	10
384817	Bromus tomentellus	Iran	1.4
384818	Bromus tomentellus	Iran	Trace
325240	Calamagrostis arundinacea	USSR	Trace
T-12676	Dactylis glomerata	Wales	Trace
368881	Dactylis glomerata	Portugal	5
T-7149	Dactylis marina	Portugal	8
346967	Dactylis marina	Wales	3
346968	Dactylis marina	Portugal	7
346969	Dactylis marina	Wales	2

PI or T Number	Name	Source	Grams
T-11430	Dactylis polygama	Romania	1
T-10477	Danthonia spicata	Canada	1
T-6777	Deschampsia caespitosa	Norway	Trace
345978	Elymus arenarius	Norway	12
T-11520	Lolium perenne	Romania	Trace
T-12716	Lolium perenne	France	Trace
T-12719	Lolium perenne	France	Trace
T-10487	Lolium temulentum	Denmark	26
T-10488	Lolium temulentum	France	3
T-10489	Lolium temulentum	France	30
T-11523	Lolium temulentum	Romania	46
T-11699	Lolium temulentum	Poland	37
T-11728	Lolium temulentum	Switzerland	67
T-12725	Lolium temulentum		30
T-12726	Lolium temulentum	Switzerland	48
T-12727	Lolium temulentum	W. Germany	14
T-12728	Lolium temulentum	E. Germany	26
T-10490	Paspalum dilatatum	Denmark	227
T-10491	Paspalum dilatatum	France	364
T-10492	Paspalum prostratum	Denmark	3
T-10494	Paspalum stoloniferum	Hungary	Trace
T-10495	Paspalum vaginatum	France	3
T-11169	Phalaris aquatica	Greece	Trace
410370	Tetrachne dregei	S. Africa	Trace

Legumes

PI or T Numbers	Name	Source	Grams
T-10504	Biserrula pelecinus	Denmark	11
T-10505	Biserrula pelecinus	Greece	10
322325	<u>Cassia</u> sp.	Brazil	Trace
T-10506	Coronilla coronata	W. Germany	Trace
T-10509	Coronilla varia	Canada	1
T-10513	Coronilla varia	Hungary	Trace
T-12674	Coronilla varia	Hungary	2
T-11751	Desmodium canadense	Switzerland	Trace
T-6786	Desmodium sp.	Mexico	3
T-10515	Dolichos bicolor	Denmark	10
T-10518	Dolichos lablab	Denmark	14
T-13211	Dolichos <u>lablab</u>	England	7
T-10519	Dolichos leucomelas	Denmark	51
T-10520	Dolichos ornatus	Denmark	17
T-6646	Lathyrus japonicus	Denmark	Trace
T-6848	Lathyrus japonicus	Greenland	2
T-6920	<u>Lespedeza</u> sp.	Korea	37
T-12729	Lotus pedunculatus	Portugal	1
T-12730	Lotus tenuis	W. Germany	44
T-12731	<u>Lotus</u> <u>uliginosus</u>	France	Trace
T-11323	Lotus sp.		3
T-18751	Lotus sp.		2
T-12739	Macroptilium atropurpurea	Cuba	53
T-10565	Medicago polymorpha	Italy	7

PI or T Numbers	Name	Source	Grams
T-10566	Medicago polymorpha	Portugal	5
T-11150	Medicago polymorpha	Greece	5
T-11151	Medicago polymorpha	Greece	3
T-11152	Medicago polymorpha	Greece	13
T-11153	Medicago polymorpha	Greece	5
T-11754	Medicago polymorpha	Switzerland	5
T-12415	Medicago polymorpha	Australia	3
T-12732	Medicago polymorpha	Czech.	4
T-12733	Medicago polymorpha	Italy	44
T-12734	Medicago polymorpha	Greece	Trace
T-12735	Medicago polymorpha	Morocco	1.7
T-12736	Medicago polymorpha	Bulgaria	1
T-12737	Medicago polymorpha	China	1
T-13220	Medicago polymorpha	England	Trace
238352	Psoralea bituminosa	Spain	73
283966	Psoralea bituminosa	France	6
T-17273	<u>Vicia</u> melanops	USSR	68
349271	Vicia melanops	Germany	31
T-7112	Vicia sepium	Norway	1
T-7113	<u>Vicia sepium</u>	Norway	Trace
T-7114	<u>Vicia sepium</u>	Denmark	Trace
T-7115	<u>Vicia</u> <u>sepium</u>	Denmark	2
308119	<u>Vicia</u> <u>sepium</u>	Czech.	Trace
346068	Vicia sepium	Norway	Trace
346069	<u>Vicia</u> sepium	Norway	2

Others

PI or T Number	Name	Source	Grams
T-4836	Achillea filipendulina		3
T-19019	Achillea filipendulina	Poland	2.7
T-6627	Achillea millefolium	Denmark	40
T-6629	Achillea millefolium	Greenland	27
T-10600	Achillea millefolium	Canada	1
T-10601	Achillea millefolium	Denmark	Trace
T-10602	Achillea millefolium	Denmark	12
T-10603	Achillea millefolium	Greenland	1.4
T-10604	Achillea millefolium	Italy	Trace
T-10606	Achillea millefolium	Hungary	1.7
T-10607	Achillea millefolium	Hungary	11
T-10608	Achillea millefolium	Norway	2.3
T-10609	Achillea millefolium	France	3
T-10610	Achillea millefolium	France	8
T-10611	Achillea millefolium	USSR	Trace
T-11404	Achillea millefolium	Romania	10
T-11422	Achillea millefolium	Romania	3
T-11433	Achillea millefolium	Romania	7
T-11434	Achillea millefolium	Romania	4
T-11467	Achillea millefolium	Romania	20
T-11646	Achillea millefolium	Poland	40
T-12611	Achillea millefolium	Switzerland	3
T-12821	Achillea millefolium	France	5
T-6630	Achillea ptarmica	Norway	Trace

PI or T Number	Name	Source	Grams
T-6631	Achillea ptarmica	Denmark	2
T-10612	Achillea ptarmica	Denmark	Trace
T-10613	Achillea ptarmica	W. Germany	Trace
T-11403	Achillea ptarmica	Romania	1
T-12239	Achillea ptarmica	W. Germany	5
T-12240	Achillea ptarmica	France	Trace
T-12241	Achillea ptarmica	France	9
T-12242	Achillea ptarmica	France	Trace
T-12822	Achillea ptarmica	France	Trace
T-6664	Armeria maritima	Norway	Trace
T-6666	Armeria maritima	Greenland	Trace
420339	Armeria maritima	Belgium	Trace
420340	Armeria maritima	Belgium	4
T-7124	Armeria maritima ssp. sibirica	Greenland	Trace
T-6672	Artemisia vulgaris	Denmark	28
T-13191	Aster rotundifolius	England	Trace
T-7137	Campanula alliarifolia	Belgium	3
T-6709	Campanula sp.		4
T-7143	Cheiranthus allionii	Norway	2
T-6626	Chrysanthemum leucanthemum	Denmark	5
T-6727	Chrysanthemum leucanthemum	Denmark	2
T-6728	Chrysanthemum leucanthemum	Denmark	8
T-10704	Coreopsis lanceolata	France	10
T-6755	Corydalis sempervirens	Denmark	4
T-6788	Digitalis purpurea	Denmark	65

PI or T Number	Name	Source	Grams
T-6789	Digitalis purpurea	Denmark	50
T-7164	Erigeron compositus	Norway	Trace
380883	Juncus sp.	Ireland	3
T-6979	Malva moshata	Denmark	64
T-7028	Monarda fistulosa	Norway	35
T-7030	Oenothera biennis	Denmark	25
T-10906	Oenothera biennis	USSR	27
T-7066	Ranunculus acris	Norway	5
T-7076	Ranunculus acris	Belgium	2
T-10876	Ranunculus acris ssp. friesianus	Denmark	Trace
T-7069	Ranunculus repens	Norway	Trace
T-7070	Ranunculus scleratus	Norway	Trace
420257	Reseda lutea	Iran	6
T-10737	Rudbeckia hirta	Canada	170
T-10738	Rudbeckia hirta	Maryland	244
T-11180	Rudbeckia hirta	Canada	80
T-70 ⁸⁹	Saponaria officinalis	Denmark	104
T-10743	Tagetes erecta	Denmark	6
T-10744	Tagetes erecta	USSR	21
T-10745	Tagetes patula	Denmark	19
T-10747	Tagetes patula	USSR	2
T-10753	Tagetes patula	USSR	9
T-10756	Tagetes patula	USSR	10
T-20712	Tagetes patula	USSR	3

PI or T Number	Name	Source	Grams
T-7098	Tanacetum vulgare	Norway	78
T-7099	Tanacetum vulgare	Norway	8

Distribution of Plant Materials

The primary function of the center is to request, assemble, and as needed, increase seed and vegetative material from foreign sources to meet requests of field plant materials centers according to priorities established in the long-range program of each PMC.

Most requests are filled from NPMC seed inventory from seed that has been reproduced here. In 1980, 2575 packets of seed were sent to field PMC's and other SCS Units.

Packet Seed Shipments to Field PMC's and Other SCS Units

Species	No. of Packets	Species	No. of Packets
Aberdeen, Idaho, PMC			
Acer ginnala	9	Artemisia campestris	1
Acer glabrum var. dougla	sii 2	ssp. borealis	1
Acer tataricum	10	Artemisia campestris ssp. campestris	1
Amelanchier alnifolia	4	Artemisia campestris	2
Amelanchier asiatica	1	ssp. <u>glutinosa</u>	2
Amelanchier canadensis	3	Artemisia campestris ssp. loydii	1
Amelanchier oblongifolia	1	Artemisia cana	1
Amelanchier ovalis	3	Artemisia <u>ludoviciana</u>	1
Amelanchier spicata	4	Artemisia ludoviciana	
Amelanchier stolonifera	1	ssp. candicans	1
Amorpha canescens	1	Aster alpinus	10
Amorpha fruticosa	12	Aster <u>alpinus</u> var. <u>leucaster</u>	1
Armeniaca vulgaris	1	Aster amellus	4
Artemisia abrotanum	1	Aster azureus	1
Artemisia borealis	1	Aster brachyactis	1
Artemisia campestris	16	Aster chilensis	2

Aberdeen, Idaho, PMC (contd	.)		
			
Aster conspicuus	1	Aster tripolium	4
Aster cordifolius	2	Aster tripolium var. longicaulis	1
Aster divaricatus	1	Aster tripolium ssp.	
Aster dracunculoides	1	tripolium ssp.	1
Aster dumosus	1	Aster umbellatus	1
Aster ericoides	1	Astragalus americanus	1
Aster flaccidus	1	Astragalus cicer	1
Aster foliaceus var. apricus	1	Astragalus danicus	3
Aster laevis var. geyeri	1	Astragalus frigidus	1
		Astragalus glycyphyllos	6
Aster lateriflorus	1	Astragalus norvegicus	1
Aster linosyris	7		
Aster novi-belgii	2	Astragalus sp.	1
	,	Berberis aquifolium	1
Aster pansus	1	Boltonia lautureana	1
Aster pappei	1	Bromus asper	1
Aster punctatus	1	bromus asper	1
Aster pyrenacus	2	Bromus erectus	20
		Bromus erectus var.	
Aster salicifolius	2	hackelli	1
Aster sedofolium	2	Bromus inermis	2
Aster sibricus	2	Bromus ramosus	9
Aster sibricus var.		Bromus ramosus ssp.	
sibricus	1	benekeni	1
Aster simplex	1	Bromus ramosus ssp.	2
Aster squamatus	2	December 4 amount of 1 land	2
Aster subintegerrimus	7	Bromus tomentellus	2
Aster subcoerulea	1	Bromus valdiviensis	1
ASCEL SUDCOETUTEA	1	Calamagrostis arundinacea	8
Aster thomsonii var. nanus	1		

Aberdeen, Idaho, PMC (cont	<u>:d.)</u>		
Calamagrostis canescens	1	Coronilla scorpiodes	4
Calamagrostis epigeios	15	Coronilla valentina ssp. glauca	1
Caragana arborescens	19	Coronilla varia	1
Caragana arborescens var.	1	Cotoneaster adpressa	2
Caragana arborescens var. sophoraefolia	1	Cotoneaster adpressa var.	1
Caragana boisii	1	Cotoneaster apiculata	1
Caragana frutex	2	Crataegus chlorosarca	5
Caragana grandiflora	1	Crataegus chrysocarpa	1
Caragana microphylla	1	Crataegus chrysocarpa var. phoenicea	1
Ceanothus arboreus	1	Crataegus douglasii	7
Chrysopsis villosa	2		
Cornus alba	3	Crataegus douglasii var. <u>suksdorfii</u>	1
Cornus alba var. sibirica	1	Crataegus maximowiczii	4
Cornus alternifolia	5	Crataegus punctata	2
Cornus amomum	2	Crataegus punctata var.	1
Cornus obliqua	2		
Cornus sanguinea	20	Crataegus roundifolia	1
Cornus sanguinea ssp.		Crataegus sanguinea	2
australis	1	Daphne mezereum .	11
<u>Cornus</u> <u>sericea</u>	2	Deschampsia cespitosa	15
Coronilla enerus	3	Deutzia gracilis	1
Coronilla enerus ssp.	1	Elymus angustus	1
Coronilla glauca	1	Elymus sibiricus	6
		Enkianthus campanulatus	7
Coronilla minima	1	Euonymus alata	5
Coronilla montana	1		

Aberdeen, Idaho, PMC (con	td.)		
Euonymus alata var. ciliatodentatus	1	Lathyrus cicera	1
Frangula alnus	21	<u>Lathyrus</u> <u>sylvestris</u>	28
Gaillardia aristata	1	Lathyrus sylvestris var. angustifolius	1
Hedysarum alpinum	2	Lathyrus sylvestris var. platyphyllus	1
Hedysarum alpinum ssp. americanum	1	Ligustrina amurensis	1
Hedysarum articum	2	Ligustrum ibota	1
Hedysarum candidum	1	Lonicera caerulea	4
Hedysarum coronarium	5	Lonicera caerulea var. altaica	2
Hedysarum hedysaroides	2	Lonicera caerulea var.	
Hedysarum multijugum	2	dependens dependens	1
Hedysarum tauricum	1	Lonicera caerulea var.	2
Heteropappus altaicus	2	Lonicera caerulea var.	
Hippophae rhamnoides	13	emphyllocalyx	1
Holodiscus discolor	3	Lonicera chrysantha	2
Holodiscus discolor var. ariaefolius	2	Lonicera fragrantissima	1
Holodiscus discolor		Lonicera gibbiflora	1
var. discolor	2	Lonicera involucrata	4
Holodiscus dumosus	1	Lonicera korolkowii	2
<u>Iris missouriensis</u>	4	Lonicera maackii	8
<u>Iris</u> <u>setosa</u>	10	Lonicera standishii	2
Iris setosa var. canadens	<u>is</u> 1	Lonicera tatarica	18
Juniperus communis	12	Lonicera tatarica var. latifolia	1
Juniperus communis	,		•
ssp. nana	1	Lonicera tatarica f. <u>lutea</u>	1
Juniperus occidentalis	1	Lonicera xylosteoides	1

Aberdeen, Idaho, PMC (co	ntd.)		
Lupinus luteus	4	Mimulus luteus var. cupreus	1
Lupinus luteus var.	5	Padus virginiana	1
Lupinus luteus var.		Penstemon acuminatus	1
maculatus	3	Penstemon affinis	1
Lupinus sp.	1	Penstemon arizonicus	1
Mahonia aquifolium	3	Penstemon attenuatus	1
Mahonia repens	2	Penstemon barbatus	3
Malus baccata	6	Penstemon calycosus	1
Malus baccata var.	1	Penstemon campanulatus	2
mandshurica	1	Penstemon confertus	1
Malus baccata var. sibirica	1	Penstemon cyananthus	1
Malus fusca	1	Penstemon digitalis	1
Malus hupehensis	1	Penstemon eatonii	1
Malus micromalus	1	Penstemon glaber	2
Malus praecox	1	Penstemon glaucus	1
Malus pumila var. niedzwetzkyana	1	Penstemon gormanii	1
	2	Penstemon gracilis	2
Malus pupurea Malus scheideckeri	1	Penstemon grandiflorus	1
	1	Penstemon hirsutus	1
Malus sieboldii	_	Penstemon laevigatus	2
Malus sylvestris	2	Penstemon menziesii	1
Malus transitoria	1	Penstemon murrayanus	1
Mimulus guetatus	2	Penstemon newberryi	1
Mimulus guttatum	3	Penstemon ovatus	3
Mimulus lewsii	4		1
Mimulus luteus	6	Penstemon procerus	1

Aberdeen, Idaho, PMC (cont	:d.)		
Penstemon procerus var. procerus	1	Prunus avium	3
Penstemon scouleri	2	Prunus dulcis	1
	2	Prunus fruticosa	1
Penstemon scouleri var. alba	1	Prunus pumila	1
Penstemon watsonii	1	Prunus pumila var. depressa	1
Penstemon whippleanus	1		
Philadelphus caucasicus	1	Prunus serotina	2
Philadelphus coronarius	4	Prunus tenella	2
Philadelphus coronarius		Prunus virginiana	1
f. aurea	1	Prunus virginiana ssp. demissa	1
Philadelphus <u>lewisii</u>	2	-	1
Philadelphus schrenkii	1	Prunus virginiana ssp. melanocarpa	1
Philadelphus tennifolius	2	Psoralea bituminosa	1
Photina villosa	4	Puccinellia distans	6
Photina villosa var.	1	Rhamnus californica	1
Physocarpus amurensis	3	Rhamnus catharticus	8
		Rhamnus dahuricus	3
Physocarpus capitatus	3	Rhamnus davuricus	1
Physocarpus intermedius	2	Rhamnus davuricus	
Physocarpus malvaceus	1	var. nipponicus	1
Physocarpus opulifolius	7	Rhamnus japonica	1
Physocarpus opulifolius f. luteus	1	Rhamnus saxatilis	2
Poa palustris	16	Rhododendron dauricum var. sempervirens	1
Pourthiaea villosa var. <u>laevis</u>	1	Rhododendron schlippenbachii	3
Prunus armeniaca	1	Rhododendron vaseyi	3

Aberdeen, Idaho, PMC (con	ntd.)	
Rhus copallina	2	Sedum acre 12
Rhus glabra	1	Sedum acre ssp. sexangularc 1
Rhus typhina	7	Sédum lanceolatum
Ribes aureum	3	var. lanceolatum 1
Ribes ordoratum	1	Sedum stenopetalum 2
Ribes petraem	3	Shepherdia canadensis 2
Rosa canina	9	Sitanion jubatum 1
Rosa rugosa	10	Sorbaria sorbifolia 6
Rosa rugosa var. pumila	1	Sorbaria sorbifolia var. stellipila
Rosa villosa	5	
Rosa woodsii	1	Spiraea alba 1
		Spiraea betulifolia 3
Rubus fruticosa	1	Spiraea chamaedryfolia 3
Rubus lacinatus	5	
Rubus vulgaris	1	Spiraea chamaedryfolia var. chamaedryfolia 1
Sambucus canadensis	7	Spiraea densiflora 1
Sambucus glauca	5	Spiraea densiflora
Sambucus nigra	26	ssp. densiflora 1
Sambucus nigra f. aurea	1	Spiraea japonica 5
Sambucus nigra f.		Spiraea japonica var. alpina 2
lacinata 1.	4	
Sambucus pubens	4	Spiraea japonica var. fortunei 1
Sambucus racemosa	19	Spiraea nipponica 3
Sambucus racemosa	,	Spiraea trichocarpa 1
var. arborescens	1	Spiraea wilsonii 1
Sambucus racemosa var. lacinata	2	
	2	Symphoricarpos chenaulti 3
Sambucus racemosa var. pubens	1	Symphoricarpos occidentalis 3

Aberdeen, Idaho, PMC (conto	d.)	Big Flats, New York PMC	
Symphoricarpos orbiculatus	8	Agropyron cristatum	1
Syringa amurensis var. amurensis	1	Agrostis gigantea	15
Syringa sweginozowii	2	Agrostis stolonifera	12
Syringa villosa	2	Agrostis stolonifera ssp. maritima	1
Tilia cordata	7	Agrostis tenuis	1
Viburnum carlesii	3	Agrostis vulgaris	2
<u>Viburnum</u> <u>cassinoides</u>	1	Alnus rugosa	1
Viburnum dentatum	2	Armeria alliacea	1
Viburnum edule	2	Armeria allioides	1
Viburnum lantana	20	Armeria alpina	6
<u>Viburnum</u> <u>lantana</u> f. <u>aureum</u>	1	Armeria arctica	1
Viburnum lentago	8	Armeria arenaria	2
Viburnum opulus	30	Armeria caespitosa	1
Viburnum prunifolium	2	Armeria cantabrica	1
<u>Viburnum</u> <u>pubescens</u>	1	Armeria elongata	2
Viburnum rhitidophyllum	2	Armeria girardii	1
Viburnum sargentii	3	Armeria halleri	4
Viburnum trilobum	3	Armeria juncea	1
Vicia pisiformis	1	Armeria juniperifolia	2
Vicia sepium	11	Armeria leucocephala	2
Vicia sepium var. montana	1	Armeria maritima	2
Americus, Georgia, PMC		Armeria maritima ssp. alpina	1
Chasmanthium latifolium	6	Armeria maritima ssp.	2
Leersia oryzoides	2	elongata	2

Big Flats, New York, PMC (contd.)

Armeria montana Armeria plantaginea Armeria plantaginea Armeria pungens Armeria ruscinonensis Armeria scabra Armeria setacea Armeria sibirica Armeria spelendens Armeria splendens Armeria undulata Armeria undulata Armeria welwitschii Baptisia tinctoria Baptisia tinctoria Cornus alba f. argenteo-marginata Cornus alba var. sibirica Cornus stolonifera f. flaviramea Cornus suecida Armeria montana Lathyrus latifolius Var. ensifolius Amedicago lupulina Oenothera biennis var. grandiflora Oenothera lamarckiana mut. blandina Oenothera lamarckiana mut. rubinernis Oenothera lamarckiana mut. suaveolens sulfurea Oenothera muricata ssp. hungarica Cornus stolonifera f. flaviramea Cornus suecida Saponaria officinalis Saponaria officinalis				
Armeria montana 1 Armeria plantaginea 1 Armeria pseudo-armeria 2 Armeria pungens 1 Armeria ruscinonensis 1 Armeria scabra 1 Armeria setacea 1 Armeria sibirica 2 Armeria splendens 1 Armeria splendens 1 Armeria splendens 1 Armeria undulata 1 Armeria welwitschii 2 Ascepias tuberosa 1 Baptisia australis 15 Baptisia tinctoria 3 Cornus alba 6 Cornus alba var. sibirica 1 Cornus sericea 3 Cornus stolonifera 7 Fi flaviramea 1 Cornus suecida 6 Eathyrus latifolius var. ensifolius var. ensifolius var. ensifolius var. ensifolius var. ensifolius var. ensifolius 2 Lathyrus latifolius var. ensifolius var. ensifolius var. ensifolius 2 Lathyrus latifolius var. ensifolius var. ensifolius 2 Lathyrus latifolius var. ensifolius var. ensifolius 2 Lathyrus latifolius var. ensifolius 2 Armeria pungens 1 Malva moschata 1 Oenothera biennis mut. sulfurea 2 Oenothera biennis var, grandiflora 2 Oenothera erythrosepala 2 Oenothera lamarckiana mut. plinaris 2 Oenothera lamarckiana mut. rubinernis 2 Oenothera lamarckiana mut. suaveolens sulfurea 2 Oenothera muricata ssp. hungarica 2 Cornus stolonifera 5 Poa compressa 2 Cornus stolonifera 5 Poa compressa 2 Saponaria officinalis 2 Saponaria officinalis 2		1	Festuca ovina	1
Armeria plantaginea 1 Armeria pseudo-armeria 2 Var. ensifolius Armeria pungens 1 Lotus uliginosus Armeria ruscinonensis 1 Malva moschata 1 Armeria scabra 1 Medicago lupulina Armeria setacea 1 Oenothera biennis 2 Armeria sibirica 2 Oenothera biennis mut. sulfurea Armeria splendens 1 Oenothera biennis var. grandiflora Armeria undulata 1 Oenothera biennis var. grandiflora Armeria undulata 1 Oenothera erythrosepala Armeria welwitschii 2 Oenothera lamarckiana mut. blandina Baptisia australis 15 Baptisia tinctoria 3 Oenothera lamarckiana mut. gigas Cornus alba 9 Oenothera lamarckiana mut. rubinernis Cornus alba f. argenteo-marginata 1 Oenothera lamarckiana mut. suaveolens sulfurea Cornus sericea 3 Cornus stolonifera 5 Poa compressa Cornus stolonifera 5 Poa compressa Cornus suecida 6 Saponaria officinalis 2	-		Holcus lanatus	1
Armeria pseudo-armeria 2 Lathyrus latifolius var. ensifolius Armeria pungens 1 Lotus uliginosus Armeria ruscinonensis 1 Malva moschata 1 Armeria scabra 1 Medicago lupulina Armeria setacea 1 Oenothera biennis 2 Armeria splendens 2 Oenothera biennis mut. sulfurea Armeria splendens 1 Var. grandiflora Armeria undulata 1 Oenothera biennis var. grandiflora Armeria welwitschii 2 Oenothera lamarckiana Ascepias tuberosa 1 Oenothera lamarckiana mut. blandina Baptisia australis 15 Baptisia tinctoria 3 Oenothera lamarckiana mut. gigas Cornus alba 9 Oenothera lamarckiana mut. rubinernis Cornus alba f. argenteo-marginata 1 Oenothera lamarckiana mut. rubinernis Cornus sericea 3 Oenothera lamarckiana mut. suaveolens sulfurea Cornus stolonifera 5 Poa compressa Cornus stolonifera 5 Poa compressa Cornus suecida 6 Saponaria officinalis 2			Lathyrus latifolius	9
Armeria pungens 1 Lotus uliginosus Armeria ruscinonensis 1 Malva moschata 1 Armeria scabra 1 Medicago lupulina Armeria setacea 1 Oenothera biennis 2 Armeria sibirica 2 Oenothera biennis mut. sulfurea Armeria splendens 1 Oenothera biennis var. grandiflora Armeria undulata 1 Oenothera erythrosepala Armeria welwitschii 2 Oenothera lamarckiana Baptisia australis 15 Baptisia tinctoria 3 Oenothera lamarckiana mut. blandina Cornus alba f. argenteo-marginata 1 Oenothera lamarckiana mut. rubinernis Cornus alba var. sibirica 1 Cornus sericea 3 Oenothera lamarckiana mut. suaveolens sulfurea Cornus stolonifera 5 Poa compressa Cornus stolonifera 5 Poa compressa Cornus suecida 6 Saponaria officinalis 2			Lathyrus latifolius	,
Armeria ruscinonensis 1 Malva moschata 1 Armeria scabra 1 Medicago lupulina Armeria setacea 1 Oenothera biennis 2 Armeria sibirica 2 Oenothera biennis mut. sulfurea Armeria splendens 1 Oenothera biennis var. grandiflora Armeria undulata 1 Oenothera erythrosepala Armeria welwitschii 2 Oenothera lamarckiana Ascepias tuberosa 1 Oenothera lamarckiana mut. blandina Baptisia australis 15 Baptisia tinctoria 3 Oenothera lamarckiana mut. gigas Cornus alba 9 Oenothera lamarckiana mut. rubinernis Cornus alba 6 Oenothera lamarckiana mut. rubinernis Cornus alba 7 Oenothera lamarckiana mut. rubinernis Cornus alba 6 Oenothera lamarckiana mut. rubinernis Cornus alba 7 Oenothera lamarckiana mut. rubinernis Cornus alba 6 Oenothera lamarckiana mut. suaveolens sulfurea Cornus sericea 3 Seponaria officinalis 2 Cornus stolonifera 5 Poa compressa Cornus stolonifera 6 Saponaria officinalis	Armeria pseudo-armeria	Ζ.	var. ensitolius	1
Armeria scabra 1 Medicago lupulina Armeria setacea 1 Oenothera biennis 2 Armeria sibirica 2 Oenothera biennis mut. sulfurea Armeria sp. 1 Oenothera biennis mut. sulfurea Armeria splendens 1 Oenothera biennis var. grandiflora Armeria undulata 1 Oenothera erythrosepala Armeria welwitschii 2 Oenothera lamarckiana Ascepias tuberosa 1 Oenothera lamarckiana mut. blandina Baptisia australis 15 Baptisia tinctoria 3 Oenothera lamarckiana mut. gigas Cornus alba 9 Oenothera lamarckiana mut. rubinernis Cornus alba f. argenteo-marginata 1 Oenothera lamarckiana mut. rubinernis Cornus alba var. sibirica 1 Cornus sericea 3 Oenothera lamarckiana mut. suaveolens sulfurea Oenothera muricata ssp. hungarica Cornus stolonifera 5 Poa compressa Cornus stolonifera 6 Saponaria officinalis 2 Saponaria officinalis	Armeria pungens	1	<u>Lotus uliginosus</u>	7
Armeria setacea 1 Oenothera biennis 2 Armeria sibirica 2 Oenothera biennis mut. sulfurea Armeria splendens 1 Oenothera biennis var. grandiflora Armeria undulata 1 Oenothera erythrosepala Armeria welwitschii 2 Oenothera lamarckiana mut. blandina Baptisia australis 15 Baptisia tinctoria 3 Oenothera lamarckiana mut. gigas Cornus alba 9 Oenothera lamarckiana mut. rubinernis Cornus alba 6. argenteo-marginata 1 Oenothera lamarckiana mut. rubinernis Cornus alba var. sibirica 1 Cornus sericea 3 Oenothera lamarckiana mut. suaveolens sulfurea Cornus stolonifera 5 Poa compressa Cornus stolonifera 6 Flaviramea 1 Saponaria officinalis 2 Cornus suecida 6 Saponaria officinalis	Armeria ruscinonensis	1	Malva moschata	11
Armeria sibirica 2 Oenothera biennis mut, sulfurea Armeria sp. 1 Armeria splendens 1 Oenothera biennis var. grandiflora Armeria undulata 1 Oenothera erythrosepala Armeria welwitschii 2 Oenothera lamarckiana Ascepias tuberosa 1 Oenothera lamarckiana mut. blandina Baptisia australis 15 Baptisia tinctoria 3 Oenothera lamarckiana mut. gigas Cornus alba 9 Oenothera lamarckiana mut. rubinernis Cornus alba f. argenteo-marginata 1 Oenothera lamarckiana mut. rubinernis Cornus alba var. sibirica 1 Cornus sericea 3 Oenothera lamarckiana mut. suaveolens sulfurea Cornus stolonifera 5 Poa compressa Cornus stolonifera 5 Poa compressa Cornus stolonifera 6 Saponaria officinalis 2 Cornus suecida 6 Saponaria officinalis	Armeria scabra	1	Medicago lupulina	1
Armeria sp. 1 Armeria splendens 1 Oenothera biennis var. grandiflora Armeria undulata 1 Oenothera erythrosepala Armeria welwitschii 2 Oenothera lamarckiana Ascepias tuberosa 1 Oenothera lamarckiana mut. blandina Baptisia australis 15 Baptisia tinctoria 3 Oenothera lamarckiana mut. gigas Cornus alba 9 Oenothera lamarckiana mut. rubinernis Cornus alba 6 Oenothera lamarckiana mut. rubinernis Cornus alba 7 Oenothera lamarckiana mut. rubinernis Cornus alba 9 Oenothera lamarckiana mut. suaveolens sulfurea Cornus sericea 3 Oenothera lamarckiana mut. suaveolens sulfurea Cornus sericea 3 Oenothera muricata ssp. hungarica Cornus stolonifera 5 Poa compressa Cornus stolonifera 6 Poa compressa Cornus suecida 6 Saponaria officinalis 2	Armeria setacea	1	Oenothera biennis	27
Armeria splendens 1 Oenothera biennis var. grandiflora Armeria undulata 1 Oenothera erythrosepala Armeria welwitschii 2 Oenothera lamarckiana Ascepias tuberosa 1 Oenothera lamarckiana mut. blandina Baptisia australis 15 Baptisia tinctoria 3 Oenothera lamarckiana mut. gigas Cornus alba 9 Oenothera lamarckiana mut. gigas Cornus alba f. Oenothera lamarckiana mut. rubinernis Cornus alba f. Oenothera lamarckiana mut. rubinernis Cornus alba var. sibirica 1 Oenothera lamarckiana mut. suaveolens sulfurea Cornus sericea 3 Oenothera muricata ssp. hungarica Cornus stolonifera 5 Poa compressa Cornus stolonifera 6 Poa compressa Cornus suecida 6 Saponaria officinalis 2 Cornus suecida 6 Saponaria officinalis	Armeria sibirica	2		
Armeria splendens 1 var. grandiflora Armeria undulata 1 Oenothera erythrosepala Armeria welwitschii 2 Oenothera lamarckiana Ascepias tuberosa 1 Oenothera lamarckiana mut. blandina Baptisia australis 15 Baptisia tinctoria 3 Oenothera lamarckiana mut. gigas Cornus alba 9 Oenothera lamarckiana mut. rubinernis Cornus alba f. argenteo-marginata 1 Oenothera lamarckiana mut. rubinernis Cornus alba var. sibirica 1 Cornus sericea 3 Oenothera lamarckiana mut. suaveolens sulfurea Cornus stolonifera 5 Poa compressa Cornus stolonifera 5 Poa compressa Cornus stolonifera 6 Saponaria officinalis 2 Cornus suecida 6 Saponaria officinalis	Armeria sp.	1	mut, sulturea	1
Armeria undulata 1 Oenothera erythrosepala Armeria welwitschii 2 Oenothera lamarckiana Ascepias tuberosa 1 Oenothera lamarckiana mut. blandina Baptisia australis 15 Baptisia tinctoria 3 Oenothera lamarckiana mut. gigas Cornus alba 9 Oenothera lamarckiana mut. rubinernis Cornus alba f. Oenothera lamarckiana mut. rubinernis Cornus alba var. sibirica 1 Cornus sericea 3 Oenothera lamarckiana mut. suaveolens sulfurea Cornus sericea 3 Oenothera muricata ssp. hungarica Cornus stolonifera 5 Poa compressa Cornus stolonifera 6 Robinia pseudoacacia Saponaria officinalis 2 Cornus suecida 6 Saponaria officinalis	Armeria splendens	1		1
Armeria welwitschii 2 Oenothera lamarckiana Baptisia australis 15 Baptisia tinctoria 3 Oenothera lamarckiana mut. blandina Cornus alba 9 Oenothera lamarckiana mut. gigas Cornus alba f. argenteo-marginata 1 Oenothera lamarckiana mut. rubinernis Cornus alba var. sibirica 1 Cornus sericea 3 Oenothera lamarckiana mut. suaveolens sulfurea Cornus sericea 5 Poa compressa Cornus stolonifera 5 Poa compressa Cornus suecida 6 Saponaria officinalis 2				
Ascepias tuberosa 1 Oenothera lamarckiana mut. blandina Baptisia australis 15 Baptisia tinctoria 3 Oenothera lamarckiana mut. gigas Cornus alba 9 Oenothera lamarckiana mut. rubinernis Cornus alba f. Oenothera lamarckiana mut. rubinernis Cornus alba var. sibirica 1 Oenothera lamarckiana mut. suaveolens sulfurea Cornus sericea 3 Oenothera muricata ssp. hungarica Cornus stolonifera 5 Poa compressa Cornus stolonifera 6 Robinia pseudoacacia 1 Cornus suecida 6 Saponaria officinalis 2	Armeria undulata	1	Oenothera erythrosepala	4
Baptisia australis Baptisia tinctoria Cornus alba Cornus alba f. argenteo-marginata 1 Cornus alba var. sibirica 1 Cornus sericea 3 Cornus stolonifera f. flaviramea 1 Cornus suecida 6 Baptisia australis mut. blandina Mut. pilamarckiana mut. gigas Oenothera lamarckiana mut. rubinernis Oenothera lamarckiana mut. suaveolens sulfurea Oenothera muricata ssp. hungarica Oenothera muricata spp. hungarica	Armeria welwitschii	2	Oenothera lamarckiana	2
Baptisia australis Baptisia tinctoria Cornus alba Cornus alba f. argenteo-marginata Cornus alba var. sibirica 1 Cornus sericea Cornus stolonifera f. flaviramea Cornus suecida Denothera lamarckiana mut. rubinernis Oenothera lamarckiana mut. suaveolens sulfurea Oenothera muricata ssp. hungarica Robinia pseudoacacia Saponaria officinalis 2 Saponaria officinalis	Ascepias tuberosa	1		1
Cornus alba 9 Cornus alba f. argenteo-marginata 1 Cornus alba var. sibirica 1 Cornus sericea 3 Cornus stolonifera f. flaviramea 1 Cornus suecida 3 Cornus suecida 4 Cornus suecida 5 Cornus suecida 6 Cornus suecida 6 Cornus suecida 6 Cornus suecida 9 Coenothera lamarckiana mut. rubinernis Oenothera lamarckiana mut. gigas Oenothera lamarckiana mut. suaveolens sulfurea Oenothera muricata ssp. hungarica Poa compressa Robinia pseudoacacia Saponaria officinalis 2 Cornus suecida 6 Saponaria officinalis	Baptisia australis	15		1
Cornus alba f. argenteo-marginata 1 Oenothera lamarckiana mut. suaveolens sulfurea Cornus alba var. sibirica 1 Cornus sericea 3 Oenothera muricata ssp. hungarica Cornus stolonifera 5 Poa compressa Cornus stolonifera 6 Robinia pseudoacacia Saponaria officinalis 2 Cornus suecida 6 Saponaria officinalis	Baptisia tinctoria	3		1
Cornus alba f. argenteo-marginata Cornus alba var. sibirica Cornus sericea Cornus stolonifera f. flaviramea Cornus suecida Cornus suecida Cornus alba var. sibirica 1 Oenothera muricata ssp. hungarica Poa compressa Robinia pseudoacacia Saponaria officinalis 2 Saponaria officinalis	Cornus alba	9	Oenothera lamarckiana	
argenteo-marginata1Oenothera lamarckiana mut. suaveolens sulfureaCornus alba var. sibirica1Cornus sericea3Oenothera muricata ssp. hungaricaCornus stolonifera5Poa compressaCornus stolonifera f. flaviramea1Robinia pseudoacaciaCornus suecida6Saponaria officinalisCornus suecida6	Cornus alba f		mut. rubinernis	1
Cornus alba var. sibirica 1 Cornus sericea 3 Oenothera muricata ssp. hungarica Cornus stolonifera 5 Poa compressa Cornus stolonifera 7 Robinia pseudoacacia 8 Saponaria officinalis 2 Saponaria officinalis 2 Saponaria officinalis		1		
Cornus sericea3ssp. hungaricaCornus stolonifera5Poa compressaCornus stolonifera f. flavirameaRobinia pseudoacaciaCornus suecida1Saponaria officinalis2Saponaria officinalis2	Cornus alba var. sibirica	1	mut. suaveolens sulfurea	<u>a</u> 1
Cornus stolonifera5Poa compressaCornus stolonifera f. flavirameaRobinia pseudoacaciaCornus suecida1Saponaria officinalis2Saponaria officinalis2	Cornus sericea	3		2
f. flaviramea 1 Cornus suecida 6 Saponaria officinalis 2 Saponaria officinalis	Cornus stolonifera	5		3
Cornus suecida 6 Saponaria officinalis 2 Saponaria officinalis			Robinia pseudoacacia	1
Cornus suecida 6 Saponaria officinalis	t. <u>flaviramea</u>	1	Saponaria officinalis	29
	Cornus suecida	6		
	Festuca idahoensis	1		1

Big Flats, New York, PMC	(contd,)		
Trifolium arvanse	12	Aster foliaceus var, foliaceus	1
Trifolium medium Trifolium medium sarosiense	1	Aster foliaceus var. parryi	1
34103101130	•	Aster fruticosus	1
Bridger, Montana, PMC		Aster glehnii	1
Amorpha canescens	1	Aster herveyi	2
Antennaria lanata	1	Aster himalaicus	3
Artemisia tripartita	1	Aster ibericus	1
Artemisia vulgaris	15	Aster lanceolatus	2
Aster acris	3	Aster linosyris	8
Aster alpinus	15	Aster modestus	1
Aster alpinus roseus	1	Aster mongolicus	3
Aster alpinus var. waljii	. 1	Aster novi-belgii	2
Aster altaicus	1	Aster oreophilus	1
Aster amellus	4	Aster polycephalus	1
Aster bietii	1	Aster purdomii	1
Aster campestris var. campestris	1	Aster pyrenaeus	2
Aster ciliolatus	1	Aster rotundifolius	1
Aster conspicuus	1	Aster salignus	4
Aster divaricatus	1	Aster sedifolius	1
Aster dumosus	1	Aster sibiricus	1
Aster farrieri	2	Aster sibiricus var. sibiricus	1
Aster foliaceus var. apicus	1	Aster squamatus	1
Aster foliaceus	_	Aster subcaeruleus	2
var. cusickii	1	Aster tibeticus	3

Bridger, Montana, PMC (contd.)		
Aster tibeticus albus	1	Penstemon diffusus	3
Aster tongolensis	4	Penstemon digitalis	1
Aster tradescantii	2	Penstemon gemtianoides	2
Aster tripolium	4	Penstemon gloxinoides	1
Aster tripolium var. discoideus	1	Penstemon gracilis	1
Aster tripolium	-	Penstemon hartwegii	1
var. longicaulis	1	Penstemon hirsutus	2
Aster versicolor	1	Penstemon hybridus	1
Aster yuannaensis	1	Penstemon laevigatus	5
Bouteloua hirsuta	1	Penstemon linariodes	1
Chrysothamnus nauseous	2	Penstemon ovatus	2
Dlymus junceus	1	Penstemon procerus	1
Erigeron aliceae	1	Penstemon rattanii	1
Erigeron compositus var. discoidus	1	Penstemon secundiflorus	1
Erigeron speciosus var. macranthus	1	Penstemon serrulatus Penstemon venustus	3
Erigeron umbellatum	1	Penstemon whippleanus	1
Hedysarum boreale ssp. boreale	1	Penstemon sp.	1
-	1	Poa compressa	7
Penstemon acuminatus		Psathyrostachys juncea	1
Penstemon azureus	2	Sitanion hystrix	1
Penstemon barbatus	2	Trifolium lupinaster	1
Penstemon barbatus var. coccineus	1	Vicia cassubica	1
Penstemon campanulatus	3	Vicia cracca	1
Penstemon confertus	1	<u>Vicia</u> orobus	1

Bridger, Montana, PMC (cont	<u>td,)</u>		
Vicia pisiformis	2	Cassia unifolia	1
Vicia sepium	1	Cassia sp.	2
Brooksville, Florida, PMC		Centrosema arenarium	1
Aeschynomene americana	3	Centrosema plumieri	2
Aeschynomene falcata	1	Centrosema pubescens	14
Aeschynomene indica	1	Centrosema virginianum	12
Aeschynomene paniculata	1	Centrosema sp.	2
Aeschynomene sp.	3	Clitoria laurifolia	2
Cajanus cajan	1	Clitoria rubiginosa	1
Calopogonium mucunoides	7	Clitoria ternatea	14
Calopogonium sp.	1	Crotalaria alata	1
Canavalia ensiformis	2	Crotalaria anagyroides	5
Canavalia gladiata	1	Crotalaria argyroloboides	1
Cassia abbreviata	1	Crotalaria astragalina	3
Cassia artemasioides	1	Crotalaria atrorubens	1
Cassia bonaviensis	1	Crotalaria brachystachya	2
Cassia flexuosa	1	Crotalaria brownei	1
Cassia hirsuta	1	Crotalaria eriocarpa	1
Cassia floridunda	1	Crotalaria falcata	1
Cassia latistipula	1	Crotalaria grantiana	2
Cassia leshenaultiana	1	Crotalaria incana	11
	3	Crotalaria juncea	2
Cassia mimosoides		Crotalaria laburnifolia	
Cassia patellaria	1	ssp. <u>australis</u>	1
Cassia pleurocarpa	1	Crotalaria lanceolata	6
Cassia rotundifolia	1	Crotalaria leioloba	1

Brooksville, Florida, PMC	(contd.)		
Crotalaria medicaginea	2	Prunus cerasifera	2
Crotalaria micronata	2	Scirpus americanus	1
Crotalaria nitans	1	Spartina pectinata	2
Crotalaria ochroleuca	2	Thuja occidentalis	9
Crotalaria orixensis	1	Thuja occidentalis	1
Crotalaria paulina	1	f. <u>fastigiata</u>	1
Crotalaria pallida	1	Coffeeville, Mississippi, P	мс
Crotalaria pilosa	1	Calamagrostis	2
Crotalaria quinquefolia	1	pseudophragmites	1
Crotalaria retusa	2	Medicago <u>lupulina</u>	1
Crotalaria saltiana	9	Hoolehua, Hawaii, PMC	
Crotalaria sericea	1	Atriplex nummularia	1
Crotalaria spectabilis	3	Centrosema pubescens	1
Crotalaria sphaerocarpa	1	Desmodium cinerascens	1
Crotalaria stipularia	4	Desmodium intortum	1
Crotalaria trifoliastrum	1	Dolichos lablab	1
Crotalaria zanaibarica	2	Glycine wightii	1
Crotalaria sp.	2	Macroptillium atropurpurem	4
Cone May New Jonsey DMC		Medicago polymorpha	2
Calemagnestis amundinassa	1	Sporobolus airoides	1
Calamagrostis arundinacea	2	Sporobolus wrightii	1
Myrica cerifera			
Myrica pennsylvanica	2	Lincoln, Nebraska, Range Co	nservationist
Phalaris aquatica	9	Vicia angustifolia	1
Pinus pinaster	5	<u>Vicia</u> dasycarpa	1
Poa compressa	1	<u>Vicia</u> <u>exigua</u>	1

Lincoln	, Nebraska,	
Range	Conservationist	(contd.)

Vicia <u>lathroides</u>	1	Acacia nilotica	1
Vicia leavenworthii	1	Acacia retinoides	1
Vicia pannonica	1	Acacia saligna	1
<u>Vicia</u> <u>sativa</u>	1	Acacia smattii	1
<u>Vicia</u> <u>tenuifolia</u>	1	Acacia suaveolens	1
Lockeford, California, PMC		Acacia verticillata	2
Acacia angustissima	- 1	Agropyron elongatum	1
Acacia armata	1	Agropyron intermedium	4
Acacia berlandieri	1	Agropyron intermedium var. intermedium	4
Acacia constricta	1	Agropyron intermedium var. trìchophorum	1
Acacia constricta paucispina	1	Agropyron pectiniforme	3
Acacia cyclops	1	Agropyron trichophorum	3
Acacia dealbata	1	Atriplex glauca	1
Acacia decurrens	1	Atriplex halimus	2
Acacia eburnea	1	Atriplex leucoclada	1
Acacia farnesiana	2	Atriplex tatarica	1:
Acacia gerrardii	1	Brachiaria xantholeuca	1
Acacia horrida	2 .	Dactylis marina	1
Acacia juniperus	1	Elymus arenarius	2
Acacia karoo	1	Elymus juncens	1
Acacia linearis	1	Eucalyptus ficifolia	1
Acacia longifolia	4	Festuca arundinacea	5
Acacia melanoxylon	2	Juniperus ashei	1
Acacia neriifolia	1	Juniperus cedrus	3

Lockeford, California, PMC	(contd.)		
Juniperus chinensis	5	Pinus densiflora	1
Juniperus communis	3	Pinus echinata	2
Juniperus drupacea	1	Pinus griffithiana	1
Juniperus excelsa	1	Pinus halepensis	1
Juniperus oxycedrus	1	Pinus koraiensis	1
Juniperus oxycedrus ssp. macrocarpa	1	Pinus monticola	2
Juniperus phoenicea	5	Pinus mugo	1
Juniperus phoenicea		Pinus nigra	3
var. <u>lycia</u>	1	Pinus parviflora var. pentaphylla	1
Juniperus rigida	1	Pinus pinea	5
Juniperus sabina	1	Pinus ponderosa	3
Juniperus squamata	1	Pinus pumila	2
Juniperus virginiana	2	Pinus rigida	2
Juniperus wallichiana	1	Pinus stankewiczii	1
Kochia prostrata	1		
Lolium perenne	11	Pinus sylvestris	5
Lolium remotum	1	Pinus taeda	2
Lolium temulentum	2	Pinus wallichiana	1
Paspalum dilatum	1	Manhattan, Kansas, PMC	
Pinus banksiana	1	Amygdalus nana	2
Pinus brutia	1	Biota orientalis	3
Pinus bungeana	1	Ceanothus americanus	4
Pinus canariensis	2	<u>Ceanothus</u> <u>delilianus</u>	1
Pinus cembra	1	Ceanothus ovatus	1
Pinus cambra var. sibirica	1	Ceanothus thyrsiflorus	1

Manhattan, Kansas, PMC (contd.)				
Ceanothus velutinus var. laevigatus	1	Cotoneaster dielsiana var. elegans	2	
Celtis australis	8	Cotoneaster disticha	3	
Celtis glabrata	1	Cotoneaster divaricata	7	
Celtis laevigatus	1	Cotoneaster faveolata	3	
Celtis occidentalis	7	Cotoneaster franchetii	9	
Celtis sinensis	1	Cotoneaster frigida	3	
Celtis tournefortii	1	Cotoneaster harroviana	2	
Cotoneaster acuminata	2	Cotoneaster harysmithii	2	
Cotoneaster acutifolia	3	Cotoneaster hebephylla var. fulvida	1	
Cotoneaster affinis var. bacillaris	2	Cotoneaster henryana	2	
Cotoneaster allochrus	1	Cotoneaster horizontalis	15	
Cotoneaster amoena	1	Cotoneaster huphensis	2	
Cotoneaster apiculata	2	Cotoneaster hybrida	1	
Cotoneaster bullata	15	Cotoneaster hybrida var. pendula	1	
Cotoneaster bullata var. floribunda	2	Cotoneaster ignava	1	
Cotoneaster buxifolia	1	Cotoneaster insignis	1	
Cotoneaster buxifolia	1	Cotoneaster intergerrima	15	
var. vellaea	2	Cotoneaster karatavica	1	
Cotoneaster congesta	3	Cotoneaster lactea	7	
Cotoneaster conspicua	1	Cotoneaster lindleyi	2	
Cotoneaster crispa Cotoneaster dammeri	5	Cotoneaster lucida	10	
Cotoneaster dammeri	3	Cotoneaster melanocarpa	3	
Cotoneaster dammeri var. radicans	4	Cotoneaster microphylla	5	
Cotoneaster dielsiana	7	Cotoneaster microphylla var. cochleata	2	

Manhattan, Kansas, PMC (cor	ntd.)		
Cotoneaster microphylla var. melanotricha	1	Cotoneaster sterniana	1
Cotoneaster microphylla		Cotoneaster tauricus	1
var. thymifolia	1	Cotoneaster tomentosa	2
Cotoneaster moupiensis	8	Cotoneaster turbinata	1
Cotoneaster multiflora	8	Cotoneaster uniflora	1
Cotoneaster nanshan	2	Cotoneaster wardii	6
Cotoneaster nebrodensis	4	Cotoneaster watereri	3
Cotoneaster nigra	5	Cotoneaster zabelii	3
Cotoneaster nigra var. laxiflora	1	Cotoneaster zeravschanicus	1
Cotoneaster nitens	4	Cotoneaster sp.	2
Cotoneaster obscura	1	Crataegus maximowiczii	1
	2	Crataegus rivularis	1
Cotoneaster pannosa		Crataegus sanguinea	1
Cotoneaster praecox	7	Elaeagnus angustifolia	10
Cotoneaster pseudoambigua	1		1
Cotoneaster racemiflora	1	Elacagnus argentea	6
Cotoneaster racemiflora		Elaeagnus commutata	O
var. soongarica	1	Penstemon arizonicus	1
Cotoneaster rosea	5	Penstemon attenuatus	1
Cotoneaster rotundifolia	1	Penstemon barettae	1
Cotoneaster rubens	1	Penstemon confertus	1
Cotoneaster salicifolia	8	Penstemon digitalis	1
Cotoneaster salicifolia var. floccosa	1	Penstemon grandiflorus	2
	_	Penstemon laevigatus	1
Cotoneaster saxatilis	1	Penstemon serrulatus	1
Cotoneaster simonsii	5		
Cotoneaster splendens	1	Penstemon watsonii	1

Manhattan, Kansas, PMC	(contd.)		
Prunus mackii	1	Rosa davurica	1
Prunus pensylvanica	3	Rosa dupontii	1
Prunus serotina	5	Rosa gallica	3
Prunus tomentosa	1	Rosa gallica var.	1
Prunus virginiana	4		•
Prunus virginiana		Rosa gallica var. versicolor	1
var. melanocarpa	1		3
Rhus aromatica	3	Rosa glauca	3
Rhus trilobata	1	Rosa glutinosa	1
		Rosa gymnocarpa	1
Rosa acicularis	8	Rosa hugonis	1
Rosa acicularis	2		2
var. nipponensis	2	Rosa judyillii	2
Rosa agrestis	2	Rosa laxa	1
Rosa alba	1	Rosa majalis	3
Rosa beggeriana	1	Rosa micrantha	1
Rosa bella	1	Rosa montana	1
Rosa blanda	3	Rosa moyesii	5
Rosa brumonii	1	Rosa nitida	1
Rosa canina	14	Rosa nutkana	2
Rosa carolina	1	Rosa omeinsis	1
Rosa centifolia	2	Rosa omissa	2
Rosa chinensis	2	Rosa palustris	1
Rosa coriifolia	1	Rosa pendula	7
Rosa corymbifera	1	Rosa pimpinellifolia	8
Rosa damascens	2	Rosa pimpinellifolia f. spinosissima	1
Rosa davidii	1	1. <u>Spinosissima</u>	1

Manhattan, Kansas, PMC (co	ntd.)		
Rosa pisocarpa	2	Thuja orientalis	10
Rosa pouzinii	1	Unknown	1
Rosa pulverulenta	1	Deliver Alegale DMC	
Rosa roxburghii	2	Palmer, Alasak, PMC	
Rosa rubiginosa	3	Abies balsamea	1
Rosa rubrifolia	4	Agropyron inerme	1
Rosa rugosa	15	Agropyron intermedium	3
Rosa rugosa var.		Bromus sitchensis	1
albiflora	1	Coronilla varia	2
Rosa santi-andreae	1	Dactylis glomerata	3
Rosa sempervirens	3	Festuca arundinacea	1
Rosa serafinii	2	<u>Lathyrus</u> <u>sylvestris</u>	1
Rosa spinosissima	3	Doubland Onesan DMC	
Rosa setipoda	1	Portland, Oregon, PMS	
Rosa sweginzowii	1	<u>Lespedeza</u> <u>bicolor</u>	1
Rosa tomentosa	1	Quicksand, Kentucky, PMC	
Rosa tuschetica	1	Agrostis gigantea	1
Rosa villosa	5	n I de Midie Ma	
Rosa virginiana	1	Rose Lake, Michigan, PMC	
Rosa waitziana	1	Asclepias tuberosa	1
Rosa watsoniana	2	Aster novae-angliae	1
Rosa webbiana	1	Chamaenerion angustifolium	6
Rosa wichuriana	1	Chrysanthemum leucantheum	19
Rosa willmottiae	1	Chrysanthemum leucantheum var. grandiflorum	1
Rosa woodsii ssp. woodsii	1	Chrysanthemum leucantheum	
Rosa xanthina	2	var. meridionale	1

Rose Lake, Michigan, PMC	(contd.)		
Epilobium angustifolium	8	Acacia binervata	1
Epilobium angustifolium ssp. angustifolium	1	Acacia buxifolia	1
Erianthus ravennae	1	Acacia calamifolia	1
Hemerocallis flava	2	Acacia cardiophylla	1
Hemerocallis flava		Acacia cyclops	1
var. minor	1	Acacia dealbata	1
Hemerocallis lilioasphodelus	2	Acacia dietrichiana	1
Lythrum salicaria	19	Acacia doratoxylon	1
	1	Acacia eburnea	1
Potentilla recta	1	Acacia erioloba	1
Salina, Kansas, PMS		Acacia erubescens	1
Lespedeza stipulacea	1	Acacia farnesiana	1
Lespedeza striata	1	Acacia fimbriata	1
Trifolium agrarium	1	Acacia galpinii	1
Trifolium dubium	1	Acacia genistifolia	1
Trifolium fragiferum	1	Acacia gerrardii	1
Trifolium resupinatum	1	Acacia goetzei ssp.	1
Trifolium striatum	1	Acacia hebeclada	1
Tucson, Arizona, PMC		Acacia holosericea	1
Acacia abyssinica calophylla	1	Acacia homalophylla	1
Acacia alata	1	Acacia horrida	2
		Acacia implexa	1
Acacia arenaria	1	Acacia ixiophylla	1
Acacia baileyana	1	Acacia ligulata	1
Acacia beckleri	1	Acacia iiguiata	1

Tucson, Arizona, PMC (co	ontd.)		
Acacia linearis	1	Acacia spectabilis	1
Acacia longifolia	1	Acacia stricta	1
Acacia melanoxylon	1	Acacia suaveolens	1
Acacia microbotrya	1	Acacia swazica	1
Acacia montana	1	Acacia terminalis	1
Acacia myrtifolia	1	Acacia tortilis	1
Acacia nilotica	1	Acacia uncinata	1
Acacia nilotica	1	Acacia urophylla	1
ssp. adonsonii Acacia nilotica	1	Acacia viscidula	1
ssp. kraussiana	1	Acacia sp.	2
Acacia paradoxa	1	Albizia julibrissin	1
Acacia pentagona	1	Albizia lophantha	3
Acacia polyacantha ssp. campylacantha	1	Aristida diffusa	1
-	1	Aristida pennata	1
Acacia prominens		Aristida plumosa	2
Acacia pycnantha	1	Aristida pungens	1
Acacia pyrifolia	1	Atriplex inflata	2
Acacia retinoides	1	Atriplex lindleyi	1
Acacia robusta	1	Atriplex semibaccata	2
Acacia salicina	1	Bauhinia galpinii	1
Acacia saligna	1	Callistemon brachyandrus	1
Acacia schweinfurthii	1		1
Acacia senegal var.	1	<u>Callistemon</u> <u>citrinus</u>	
rostrata	1	<u>Callistemon</u> <u>coccineus</u>	1
Acacia seyal	1	Callistemon linearis	1
Acacia sieberana var.	1	<u>Callistemon</u> <u>pendulus</u>	1

Tucson, Arizona, PMC (con	td.)		
Callistemon phoeniceus	2	Cassia obtusifolia	1
Callistemon pinifolius	1	Cassia occidentalis	2
Callistemon rigidus	1	Cassia odorata	1
Callistemon speciosus	1	Cassia petersiana	1
Calothamnus	1	Cassia pleurocarpa	1
blepherantherus	1	Cassia senna	3
Calothamnus quadrifidus	1	Cassia sericea	1
Cassia abbreviata	1		
Cassia alata	1	<u>Cassia siamea</u>	1
Cassia australis	1	Cassia singueana	1
	1	Cassia sophera	1
Cassia bicapsularis		Cassia trosa	1
Cassia carnaval	1	Cassia uosa	1
<u>Cassia</u> <u>desolata</u>	1		1
Cassia didymobotrya	2	<u>Cassia</u> sp.	
Cassia eremophila		Casuarina acutavalvis	1
var. eremophila	1	<u>Casuarina</u> campestris	1
Cassia eremophila var. platypoda	1	Casuarina corniculata	1
	•	Casuarina cristata	2
Cassia eremophila zygophylla	1	Casuarina distyla	1
Cassia floribunda	1	Casuarina equisetifolia	1
Cassia mimosoides	1	Casuarina humulis	1
Cassia mimosoides	_	Casuarina lehmanniana	1
var. nomame	1	Casuarina littoralis	1
Cassia multijuga	1	Casuarina luehmannii	1
Cassia nemophylla	1		
Cassia nodosa	1	Casuarina muellerana	1
Cassia notabilis	1	Casuarina nana	1

Tucson, Arizona, PMC (conto	<u>d.)</u>		
Cercis siliquastrum	7	Isopogon buxifolius	1
Coix lacryma-jobi	6	Isopogon dubius	1
Crotalaria sp.	1	Kennedia prostrata	1
Dodonaea viscosa	1	<u>Kunzea</u> <u>baxteri</u>	1
Ephedra distachya	1	<u>Leptospermum</u> <u>stellatum</u>	1
Erythrina crista-galli	1	Leucaena latisiliqua	5
Eucalyptus camaldulensis	1	Leucaena leucocephala	2
Eucalyptus decipiens	1	Melaleuca diosmifolia	1
Eucalyptus erythrocorys	1	Melaleuca elliptica	1
Eucalyptus eudesmoides	1	Melaleuca huegelii	1
Eucalyptus ficifolia	1	Melaleuca hypericifolia	2
Eucalyptus gamophylla	1	Melaleuca leucadendron	1
Eucalyptus kingsmillii	1	Melaleuca teretifolia	1
Eucalyptus megacarpa	1	Reseda luteola	3
Eucalyptus zygophylla	1	Sativia verticillata	1
Fremontodendron californicum	1		
Gleditsia tricanthos	1		
Grevillea crithmifolia	1		
Grevillea leucopteris	1		
Grewia occidentalis	1		
Hyparrhenia hirta	2		
Hypericum ascyron	3		
Hypericum patulum	2		
Hypericum patulum var. henryi	1		

Domestic Distribution - Non-SCS

<u>Name</u>	PI or Other Number	Organization	Location
Dactylis glomerata	'Latar'	SEA ,	Beltsville, MD
Mimosa invisa	PI-255073	SEA-Plant Germp. Inst.	Beltsville, MD
<u>Vigna</u> <u>vexillata</u>	PI-193746	SEA-Plant Germp. Inst.	Beltsville, MD
<u>Vigna</u> <u>vexillata</u>	PI-365095	SEA-Plant Germp. Inst.	Beltsville, MD
<u>Vigna</u> <u>vexillata</u>	PI-365096	SEA-Plant Germp. Inst.	Beltsville, MD
<u>Vigna</u> <u>vexillata</u>	PI-365097	SEA-Plant Germp. Inst.	Beltsville, MD
Alopecurus arundinaceus	PI-229529	SEA-Regional PI Sta.	Pullman, WA
Achillea sp.	PI-383527	SEA-Regional PI Sta.	Pullman, WA
Achillea sp.	PI-383528	SEA-Regional PI Sta.	Pullman, WA
Astragalus sp.	PI-202149	SEA-Regional PI Sta.	Pullman, WA
Juncus sp.	PI-380883	SEA-Regional PI Sta.	Pullman, WA
<u>Lupinus</u> <u>angustifolius</u>	PI-283637	SEA-Regional PI Sta.	Pullman, WA
<u>Lupinus luteus</u>	PI-303052	SEA-Regional PI Sta.	Pullman, WA
<u>Lupinus</u> <u>luteus</u>	PI-316288	SEA-Regional PI Sta.	Pullman, WA
<u>Lupinus</u> <u>luteus</u>	PI-326278	SEA-Regional PI Sta.	Pullman, WA
<u>Lupinus luteus</u>	PI-338648	SEA-Regional PI Sta.	Pullman, WA
<u>Lupinus</u> <u>luteus</u>	PI-368920	SEA-Regional PI Sta.	Pullman, WA
Reseda lutea	PI-420257	SEA-Regional PI Sta.	Pullman, WA
Rosa sp.	PI-383745	SEA-Regional PI Sta.	Pullman, WA
Euphorbia marginata		Univ. of Maryland	College Park, MD
Sporobolus cryptandrus	T-7095	The Land Institute	Salina,KS
Sporobolus cryptandrus	T-7096	The Land Institute	Salina, KS
<u>Vicia</u> <u>benghalensis</u>	PI-308096	Carnegie Inst. of WA	Stanford, CA
Vicia dasycarpa	PI-117430	Carnegie Inst. of WA	Stanford, CA
Vicia grandiflora	T-2160	Carnegie Inst. of WA	Stanford, CA
<u>Vicia</u> <u>sativa</u>	PI-340168	Carnegie Inst. of WA	Stanford, CA
Vicia tetrasperma	PI-289520	Carnegie Inst. of WA	Stanford, CA

Foreign Shipments

One of the functions of the NPMC is to assemble and distribute seed and plants to meet foreign requests. Requests may come directly to the NPMC, to field plant materials center, or to plant materials specialists. Assembly of seed at the center prevents duplication since many times the person or organization places requests for the same material with several sources. It also allows the material to be shipped in one package, thus arriving at its destination as a unit.

When all seed or plants needed to fill a foreign request are acquired, proper paperwork is prepared and the material is transferred to the Plant Germplasm Quarantine Center of the Animal and Plant Health Inspection Service (APHIS) for inspection. When the material is cleared it is shipped to the requestor.

Listed below are the foreign shipments made during 1980, totalling 381 accessions sent to 30 countries:

Division of Plant Industry, Canberra City, Australia

Lotus corniculatus 'Winnar'

Pasture Research Station, Victoria, Australia

Agropyron elongatum 'Jose'

Lotus corniculatus 'Tana'

Vicia amphicarpa, PI-393825

Vicia amphicarpa, BN-21861

Plant Introduction Coordiantor, Brasilia, Brasil

Hemarthria altissima 'Bigalta'

Hemarthria altissima 'Redalta'

Brazisul AGRO Pecuaria Ltd., Porto Alegra, Brasil

Bouteloua gracilis 'Hachita'

Plant Industry Division, Lethbridge, Alberta, Canada

Elymus triticoides 'Shoshone'

Royal Botanical Gardens, Hamilton, Ontario, Canada

Robinia fertilis 'Arnot'

Butternut Farm, Markham, Ontario, Canada Salix bockii, T-19398

Central Experiment Farm, Ottawa, Ontario, Canada

Bromus inermis 'Manchar' .

Seed Biology Laboratory, Ottawa, Ontario, Canada

Bromus biebersteinii 'Regar'

Koospol Co., Ltd., Praha, Czechoslavakia

Trifolium vesiculosum 'Amclo'

UNDP, San Domingo, Dominican Republic

Pueraria lobata, PI-186600

Colworth Laboratory, Sharnbrook, Bedford, England

Lupinus albifrons, PI-308042

<u>Lupinus</u> <u>albus</u>, PI-289160, PI-316276, PI-316278, PI-316279, PI-316287, PI-338645, PI-368911, PI-368912, PI-368913, PI-368914, PI-368915

<u>Lupinus</u> angustifolius, PI-280627, PI-283638, PI-289163 PI-316280, PI-316281

Lupinus arboreus, PI-393932

Lupinus aridus, PI-308041

Lupinus elegans, PI-185099

Lupinus hirsutus, PI-289167

<u>Lupinus</u> <u>1uteus</u>, PI-289173, PI-316283, PI-316284, PI-316285 PI-316286, PI-430549

Lupinus mutabilis, PI-308050

<u>Lupinus</u> <u>nanus</u>, PI-308051

<u>Lupinus</u> <u>ornatus</u>, PI-308052

Lupinus pilosus, PI-292414

Lupinus polyphyllus, PI-414242

Lupinus reticulatus, PI-280628

Lupinus varius, PI-197574, PI-33649

Lupinus sp., NY-5218, NY-5277

Hurst Gunson Cooper Taber Ltd, Colchester, Essex, England

Oenothera biennis, T-2557, PMK-1561

Oenothera lacinata

Oenothera lamarckiana, T-2070

Oenothera speciosa, AM-4057

Hurst Gunson Cooper Taber Ltd., Witham, Essex, England

Agropyron spicatum 'Secar'

Cooperative Agricole Semences Quest, France

Bromus carinatus 'Cucamonga'

B. sub. nom. sitchensis, T-11339

Bromus unioloides 'Nakuru', PI-385317, PI-409139

Bromus willdenouii, PI-377533

Agency for International Development, Banjul, Gambia

Brachiaria brizantha, PI-292176

Cenchrus ciliaris, PI-271198, PI-414419, 'Higgins'

Chloris distichophylla, PI-421755

Chloris gayana 'Bell'

Digitaria mombasana, PI-406167

Digitaria vestita, PI-377758

Fingerhuthia sesleriaeformis, PI-203354, PI-299970

Panicum amaralum, PI-421136

Panicum clandestinum 'Tioga', T-4862

Panicum maximum, PI-410251, PI-410255

Panicum virgatum 'Alamo', PI-421901

Coxen Hole, Islas de la Bahia, Honduras

Astragalus cicer, PI-214095

Astragalus galegiformis, PI-186282

Astragalus hamosus, PI-311360

Astragalus macrorrhizus, PI-311364

Astragalus monspessulanus, PI-311366

Astragalus sinicus, PI-150557

Astragalus somaliensis, PI-188576

Agriculture and Fisheries Department, Kowloon, Hong Kong

Bouteloua gracilis, T-4503, 'Lovington', T-8318

<u>Lathyrus</u> <u>sylvestris</u>, PI-282562, PI-282765, PI-290715, PI-355714

Panicum clandestinum, T-4862, T-16960, T-16961

Trifolium hirtum, PI-120079, PI-120122, PI-120124, PI-120125, PI-120130, PI-120131, PI-120137, PI-120146, PI-120179, PI-120188, PI-120198, PI-120231, PI-120248, PI-121232, PI-121247, PI-284269, PI-284270, PI-284272, PI-289673, PI-289674, PI-311483, PI-311484, PI-311485, PI-311486, PI-311487, 'Kondinin'

Vicia dasycarpa 'Lana', PI-205158, PI-249882, PI-308100

Vicia villosa, PI-206492, PI-222217, PI-232958, PI-234053, PI-250796, PI-229960, PI-286529, PI-308123, PI-314404, PI-338682, PI-340170, PI-340171, PI-340172, PI-340173, PI-340174, PI-340175, PI-340176, PI-383802

Ministry of Agriculture, Forestry Division, Israel

Robinia fertilis 'Arnot'

General Counsel, Court of Appeals, Bari, Italy

Pueraria lobata, PI-434246

University of Padua, Bolzano, Italy

Pueraria lobata, AM-3116

Communita Montana, Borgo Val Di Taro, Italy

<u>Pueraria lobata</u>, PI-434246

Mr. Giancarlo Rinaldi, Caserta, Italy
Pueraria lobata, BN-22974

University of Florence, Florence, Italy

Astragalus cicer

Echinochloa crusgalli var. frumentacea 'Chiuapa'

Eragrostis curvula 'Catalina'

Pueraria phaseoides

Stipa viridula 'Green Stipa'
Mr. Sanvito Roberto, Milano, Italy

Pueraria lobata, BN-22974

Dr. Luciano del Frate, Parma, Italy
Pueraria lobata, AM-3116

Azienda Agricola, Quarto diAsti, Italy
Pueraria lobata, PI-434246

Sr. Gino Giovetti, Spilamberto, Italy
Pueraria lobata, AM-3116

Dr. Sergio Ciallie, Torino, Italy
Pueraria lobata, AM-3116

Dr. Mario Fasano, Torino, Italy

Pueraria lobata, BN-22974

Peace Corps, Kingston, Jamaica

<u>Coronilla varia "Penngift"</u>

Eragrostis curvula 'Catalina'

Integrated Rural Development Project, Manchester, Jamaica

<u>Coronilla varia 'Penngift'</u>

Eragrostis curvula 'Catalina'

Mr. Richard Boucher, Peace Corps, Manchester, Jamaica

<u>Coronilla varia</u> 'Penngift'

Eragrostis curvula 'Catalina'

Mr. Mark Peters, Peace Corps, Manchester, Jamaica

<u>Coronilla varia</u> 'Penngift'

<u>Eragrostis curvula</u> 'Catalina'

Shizuoka University, Ohya, Shizuoka, Japan

<u>Panicum maximum</u> "Coosa"

<u>Panicum texanum</u>, F-639

Agricultural Attache, American Embassy, Seoul, Korea

Agropyron cristatum 'Parkway'

Agropyron desertorum 'Nordan'

Agropyron elongatum 'Jose'

Dactylis glomerata 'Latar'

Festuca arundinacea 'Ky-31'

Lolium perenne 'Manhattan'

Lolium rigidum 'Wimmera 62'

Lotus tenius, T-2494

Medicago sativa 'Williamsburg'

Phalaris tuberosa var. stenoptera 'Fino'

Trifolium repens, 'Dutch' and 'Ladino'

Benmore Station, Canterbury, New Zealand

Astragalus cicer "Lutana"

Coronilla varia, 'Chemung', 'Emerald', and 'Penngift'

Lotus corniculatus 'Tana'

Medicago sativa 'Nomad'

Aokautere Science Center, Palmerston, New Zealand

Agropyron intermedium, 'Amur' and 'Oahe'

Agropyron trichophorum 'Luna'

Bromus bieberstenii 'Regar'

Bromus inermis, 'Lincoln' and 'Manchar'

Elymus junceus 'Vinall'

Lotus corniculatus 'Cascade'

Oryzopsis hymenoides 'Nezpar'

American Embassy, Lisbon, Portugal

Ornithopus sativus, PI-284143

Gradina Agrobotanica, St. Manastur, Romania

Trifolium repens, 'Ladino', Louisiana 'S-1', 'Nolin's', and 'Regal'

Department of Agriculture and Forestry, St. Helens Island, South Atlantic

Coronilla varia 'Chemung'

Eragrostis chloromelas 'Catalina'

Eragrostis curvula 'Morpa'

Lespedeza cuneata 'Interstate'

Portulacaria afra, PI-407530 and PI-407531

Robinia pseudoacacia, Commerical

Scottish Agricultural Industries Ltd., Midlothian, Scotland

Agropyron dasystachyum 'Critana'

Agropyron desertorum 'Nordan'

Agropyron elongatum 'Jose'

Agropyron inerme 'Whitmar'

Agropyron intermedium 'Greenar'

Agropyron riparium 'Sodar'

Agropyron sibiricum, PI-108434

Agropyron smithii 'Rosana'

Agropyron subsecundum, PI-371698

Agropyron trachycaulum 'Primer'

Agropyron trichophorum 'Luna'

Andropogon gerardi 'Kaw'

Andropogon halli 'Elida'

Bothriochloa caucasicus, PMT-588

Bothriochloa ischaemum 'KR'

Bouteloua curtipendula 'El Reno'

Bouteloua eripoda 'Nogal'

Bouteloua gracilis 'Lovington'

Bromus inermis 'Manchar'

Buchloe dactyloides, PI-421717

Elymus canadensis, PMT-4395

Elymus cinereus, P-15590

Elymus junceus 'Vinall'

Elymus triticoides, P-15594

Eragrostis curvula 'A-67'

Eragrostis lehmanniana 'A-68'

Eragrostis trichodes 'Bend'

Panicum virgatum 'Blackwell'

Phalaris arundinacea 'Ioreed'

Sorghastrum nutans 'Osage'

Sorghum sudanense 'Piper'

AID, American Embassy, Mogadishu, Somalia

Prosopis tamarugo, PI-441220

Embassy of South Africa, Washington, D. C.

Lotus corniculatus var. arvensis 'Kalo'

Lotus pedunculatus 'Marshfield'

Onobrychis viciifolia, PI-205200, PI-243227, PI-368036, T-6586

Starke-Ayres, Eppindust, South Africa

Agropyron spicatum 'Secar'

C. May and Company, Ltd., Johannesburg, South Africa

Bouteloua gracilis 'Hachita'

Department of Pasture and Forages, INIA-CRIDA-08, Badajoz, Spain

Agropyron cristatum, A-1770

Agropyron intermedium 'Amur'

Eragrostis curvula, A-67

Weibullsholm Plant Breeding Institute, Landskrona, Sweden

Bromus biebersteinii 'Regar'

Otto Havenstein Seeds Inc., Rafz, Switzerland

Bouteloua gracilis 'Hachita'

Agriculture Professor, Agriculture Center, Thailand

Coronilla varia 'Chemung'

Lathyrus sylvestris 'Lathco'

AID, Tunis, Washington, D. C.

Agropyron cristatum, A-1770

Agropyron elongatum , 'Jose' and 'Largo'

Agropyron intermedium, 'Oahe' and 'A-12496'

Agropyron trachycaulum 'Primar'

Agropyron trichophorum 'Trigo'

Bromus inermis 'Elsberry'

Cenchrus ciliaris, T-4464

Chloris gayana 'Bell'

Cynodon dactylon, 'Coastcross-1', 'Coastal', 'Tifton 44'
'Suwannee'

Dactylis glomerata, 'Akaroa', 'Berber', 'Latar', 'Palestine'

Ehrharta calycina 'Mission'

Ehrharta longifolia, PI-168585

Festuca arundinacea, 'Goar', 'Kenmont', 'Ky-31', 'Kenwell'

Lespedeza cuneata 'Interstate'

<u>Lespedeza</u> <u>stipulacea</u>, Commercial

Lespedeza striata, Commercial

Lotus corniculatus, 'Empire' and 'Viking'

Medicago sativa, 'El Camino', 'Mesa Sirsa', 'Moapa 69'

Ornithopus sativus, PI-284141

Oryzopsis hymenoides, 'Nezpar' and 'Paloma'

Pennisetum americanum x P. pupureum

Phalaris arundinacea, P-2369

Phalaris tuberosa 'Perla'

Sporobolus airoides, A-14711

Trifolium hirtum, Commercial

Trifolium repens 'Ladino'

Trifolium vesiculosum, 'Amclo', 'Meechee', 'Yucchi'
Vicia dasycarpa 'Lana'

Institute of Agriculture, Merida, Venezuela

Astragalus cicer, 'Lutana', PI-214095, T-6508

Lespedeza cuneata, PI-82433, PI-90356, PI-173989, PI-18617, PI-207719, PI-259459, PI-259460, PI-421873 PI-421872

Lespedeza stipulacea, T-6899, T-6901, T-6902, T-6903, T-6904 T-6905

Welsh Plant Breeding Station, Averystwyth, Wales

Dactylis glomerata 'Latar'

A.N.S. Burgett, Yaounde

Agropyron gerardi, C-119

Agropyron scoparius 'Pastura'

Atriplex canescens, NM-155

Bouteloua curtipendula, NM-28

Bouteloua eriopoda 'Nogal'

Bouteloua gracilis 'Hachita'

Eragrostis curvula, A-67M

Eragrostis lehmanniana, A-68

Eragrostis trichoides, A-11527

Hilaria jamesii 'Viva'

Oryzopsis hymenoides 'Paloma'

Panicum obtusum, A-13165

Sorghanstrum nutans 'Llano'

Sporobolus airoides, NM-184

Sporobolus cryptandrus, A-16352

Sporobolus flexuosus, NM-73

Donald Gipe, Yaounde

Agropyron cristatum, A-1770

Agropyron desertorum, A-1874

Agropyron intermedium 'Amur'

Agropyron smithii 'Arriba'

Coronilla varia 'Penngift'

Eragrostis curvula 'Catalina'

Lespedeza cuneata 'Okinawa'

Melilotus officinalis, PI-289313

Panicum amorulum, PI-421136

Panicum ancepts, T-16955

Panicum antidotale, PI-185456

Panicum clandestinum, PI-413754

Panicum coloratum 'Kleingrass'

Panicum obtusum, T-2929

Panicum plenum, T-4612

Panicum texanum, T-3367

Panicum virgatum, PI-315725

Paspalum alcalinum, PI-337556

Paspalum conspersum, PI-237130

Paspalum dilatatum, PI-410286

Paspalum floridanum, PI-315730

Paspalum guenoarum, PI-337559

Paspalum malacophyllum, PI-315731 and T-16988

Paspalum nicorae 'Amcorae'

Paspalum notatum, PI-148996

Paspalum plicatulum, PI-353399

Paspalum pubiflorum v. glabrum, T-16993

Paspalum rojasii, PI-263381

Paspalum scrobiculatum, PI-198322

Paspalum tenellum, T-6588

Paspalum umbrosum, PI-203882

Paspalum urvillei, PI-365131

Pueraria lobata, PI-434246

Pueraria phaseoloides, T-7453

Sporobolus cryptandrus, T-3963

Trifolium incarnatum 'Frontier'

Livestock Credit and Procession Project, Sanaa, Yemen

Bouteloua curtipendula 'Vaughn'

Bouteloua eriopoda 'Nogal'

Bouteloua gracilis 'Lovington'

Fraxinus pennsylvanica 'Cardan'

Phleum pratense 'Eskimo'

Range Training Specialist, Sanaa, Yemen

Eragrostis lehmanniana, A-68

Heterpogon contortus, PI-441069

Penstemon grandiflora, PMK-1984

Sorgastrum nutans, PI-421594

Trichacne californica, T-3707

Accessions Planted - 1980

One hundred fifty-three different accessions were planted on the center during 1980. The plantings were made to:

- 1. Increase small amounts of available seed
- 2. Check identity
- 3. Reproduce aging seed in order to maintain viable seed in storage
- 4. Note plant performance

Grasses

PI or T Number	Name	Source
T-10474	Dactylis glomerata	Norway
T-10475	Dactylis glomerata	Norway
T-11447	Dactylis glomerata	Romania
T-11464	Dactylis glomerata	Romania
T-11477	Dactylis glomerata	Romania
T-11492	Dactylis glomerata	Romania
T-12676	Dactylis glomerata ssp. smithii	Wales
T-12677	Dactylis glomerata ssp. woronowii	Australia
T-10476	Dactylis polygama	Denmark
T-11430	Dactylis polygama	Romania
T-12548	Dactylis polygama	W. Germany
T-12675	Dactylis polygama	W. Germany
T-10477	Danthonia spicata	Canada
T-10478	Elymus arenarius	Denmark
T-10479	Elymus arenarius	Norway
T-10480	Elymus arenarius	Norway

PI or T Number	Name	Source
T-12326	Elymus arenarius	W. Germany
T-12680	Elymus glaucus	Canada
T-10481	Elymus virginicus	Canada
T-12947	Elymus virginicus	France
T-10486	Lolium perenne	Italy
T-11520	Lolium perenne	Romania
T-11521	Lolium perenne	Romania
T-11522	Lolium perenne	Romania
T-11698	Lolium perenne	Poland
T-12381	Lolium perenne	France
T-12682	Lolium perenne	Italy
T-12683	Lolium perenne	Italy
T-12684	Lolium perenne	Italy
T-12685	Lolium perenne	Romania
T-12686	Lolium perenne	Romania
T-12687	Lolium perenne	Romania
T-12688	Lolium perenne	Romania
T-12689	Lolium perenne	Italy
T-12690	Lolium perenne	Italy
T-12691	Lolium perenne	Italy
T-12692	Lolium perenne	Italy
T-12693	Lolium perenne	Italy
T-12694	Lolium perenne	Italy
T-12695	Lolium perenne	Italy
T-12696	Lolium perenne	Italy

PI or T Number	Name	Source
T-12697	Lolium perenne	Italy
T-12698	Lolium perenne	Belgium
T-12699	Lolium perenne	Belgium
T-12700	Lolium perenne	Luxembourg
T-12701	Lolium perenne	Luxembourg
T-12702	Lolium perenne	France
T-12703	Lolium perenne	France
T-12704	Lolium perenne	France
T-12705	Lolium perenne	France
T-12706	Lolium perenne	France
T-12707	Lolium perenne	France
T-12708	Lolium perenne	Switzerland
T-12709	Lolium perenne	Switzerland
T-12710	Lolium perenne	Switzerland
T-12711	Lolium perenne	Switzerland
T-12712	Lolium perenne	Switzerland
T-12713	Lolium perenne	France
T-12714	Lolium perenne	France
T-12715	Lolium perenne	France
T-12716	Lolium perenne	France
T-12717 ·	Lolium perenne	France
T-12718	Lolium perenne	France
T-12719	Lolium perenne	France
T-12720	Lolium perenne	Sweden
T-12721	Lolium perenne	W. Germany

PI or T Number	Name	Source
T-12722	Lolium perenne	W. Germany
T-12723	Lolium perenne	Iran
T-12724	Lolium perenne	Hungary
T-12725	Lolium perenne	France
T-12993	Lolium perenne	France
T-10487	Lolium temulentum	Denmark
T-10488	Lolium temulentum	France
T-10489	Lolium temulentum	France
T-11523	Lolium temulentum	Romania
T-11699	Lolium temulentum	Poland
T-11728	Lolium temulentum	Switzerland
T-12725	Lolium temulentum	Switzerland
T-12726	Lolium temulentum var. macrochaeton	Switzerland
T-12727	Lolium temulentum var. macrochaeton	W. Germany
T-12728	Lolium temulentum var. macrochaeton	E. Germany
T-10490	Paspalum dilatatum	Denmark
T-10491	Paspalum dilatatum	France
T-10492	Paspalum prostratum	Denmark
T-10493	Paspalum scrobiculatum	Hungary
T-10494	Paspalum stoloniferum	Hungary
T-10495	Paspalum vaginatum	France
T-11169	Phalaris aquatica	Greece
T-11170	Phalaris aquatica	Greece
T-10496	Phalaris arundinacea	Denmark

Legumes and Others

PI or T Number	Name,	Source
202149	Astragalus species	Argentina
383604	Astragalus species	Turkey
T-10504	Biserrula pelecinus	Denmark
T-10505	Biserrula pelecinus	Crete
T-12837	Biserrula pelecinus	France
T-10506	Coronilla coronata	W. Germany
T-10507	Coronilla juncea	France
T-10508	Coronilla parviflora	Denmark
T-10509	Coronilla varia	Canada
T-10510	Coronilla varia	France
T-10511	Coronilla varia	W. Germany
T-10512	Coronilla varia	Belgium
T-10513	Coronilla varia	Hungary
T-11417	Coronilla varia	Romania
T-11476	Coronilla varia	Romania
T-11803	Coronilla varia	Switzerland
T-12314	Coronilla varia	France
T-12315	Coronilla varia	France
T-12673	Coronilla varia	E. Germany
T-12674	Coronilla varia	Hungary
T-13207	Coronilla varia	England
T-10514	Desmodium canadense	Canada
T-11751	Desmodium canadense	Switzerland
T-10515	Dolichos bicolor	Denmark

PI or T Number	Name	Source
T-10516	Dolichos cebra	USSR
T-10517	Dolichos lablab	Denmark
T-12678	Dolichos lablab	Switzerland
T-13211	Dolichos lablab	England
T-10518	Dolichos lablab var. leucocarpus	Denmark
T-10519	Dolichos leucomelas	Denmark
T-10520	Dolichos ornatus	Denmark
T-10521	Dolichos sesquipedalis	Denmark
T-10525	Lathyrus palustris	Canada
T-12729	Lotus pedunculatus	Portugal
T-12730	Lotus tenuis	W. Germany
T-12731	Lotus uliginosus	France
T-12739	Macroptilium atropurpurea	Cuba
T-10565	Medicago polymorpha	Italy
T-10566	Medicago polymorpha	Portugal
T-11150	Medicago polymorpha	Crete
T-11151	Medicago polymorpha	Greece
T-11152	Medicago polymorpha	Greece
T-11153	Medicago polymorpha	Greece
T-11754	Medicago polymorpha	Switzerland
T-12415	Medicago polymorpha	Australia
T-12732	Medicago polymorpha	USSR
T-12733	Medicago polymorpha	Italy
T-12734	Medicago polymorpha	Crete
T-12735	Medicago polymorpha	Morocco

PI or T Number	Name	Source
T-12736	Medicago polymorpha	Bulgaria
T-12737	Medicago polymorpha	China
T-13220	Medicago polymorpha	England
T-10569	Psoralea bituminosa	France
T-11755	Psoralea bituminosa	Switzerland
T-13081	Psoralea bituminosa	Canary Islands
T-13082	Psoralea bituminosa	Canary Islands
T-13083	Psoralea bituminosa	France
T-13234	Psoralea bituminosa	England
T-12466	Teramnus labialis	France
T-12741	Thermopsis montana	Ireland
T-17273	Vicia melanops	USSR
349271	Vicia melanops	Germany
T-10599	Vicia unijuga	England

Special Projects - 1980

National Shoreline Site Selection Criteria

During 1980, the NPMC worked with the Army Corps of Engineers at Fort Belvoir, Virginia, to determine the site selection criteria (physical features) necessary to permit the use of vegetation to stabilize eroded areas in the tidal zone. After identifying over 140 tidal shoreline sites, a survey of the physical features was made at each location. An analysis of the data revealed that meaningful regional site selection criteria could be developed. The Corps of Engineers Research Center is presently working on refinement of the data.

Shoreline Erosion Demonstration Areas (Delaware Bay)

Working cooperatively with the Philadelphia District, Corps of Engineers, the NPMC assisted in planting and evaluating four Shore Erosion Advisor Panel (SEAP) plantings along the Delaware Bay. The program was initiated by an Act of Congress to demonstrate and evaluate shore erosion control techniques along the coastal plain of the United States. The Army Corps of Engineers is the prime agency for carrying out the project and for preparation of a final summary report to Congress this year.

Evaluation of Potential Drought Tolerant Orchardgrass (Dactylis glomerata) Ecotypes

At the request of the Kentucky Plant Materials Center, a project was established to evaluate drought tolerant orchardgrass accessions on a shallow shale area in West Virginia. The assembly was made by the Kentucky Center and consisted of 25 accessions collected in various counties of Virginia, West Virginia, and Maryland. These were planted to compare with the following standards:

'Jackson' 'Palestine'
'Potomac' 'Berber'
'Pennlate' Common
'Va-70'

In addition, 'Kentucky 31' tall fescue (Festuca arundinacea) was also included as a standard for comparison.

Three replications of the collection were established on a shaly ridge on the Robert Snyder farm about 7 miles north of Petersburg, West Virginia. All accessions were satisfactorily established in all replications except T-7231 and 'Palestine' which had poor stands. The accessions will be evaluated in 1981 and 1982 for drought tolerance, disease, and insect resistance and forage production.

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